DETAILED IMPLEMENTATION PLAN

Community-based Integrated Management of Childhood Illness (CIMCI) Plus Project in

Ntungamo District, Uganda

October 1, 2003 to September 30, 2008

Cooperative Agreement # FAO-A-00-99-00025-00 Modification No.02

Submitted by:

Africare Inc.
440 R Street, NW
Washington, DC 20001

In collaboration with

Ntungamo District Health Services and Uganda National IMCI Program

To:

United States Agency for International Development
Bureau for Global Health
Office of Health, Infectious Disease, and Nutrition
Washington, D.C.

Prepared and edited by:

Robert Mwesigwa, Program Coordinator, Africare/Ntungamo
Atukunda Innocent, Research Monitoring and Evaluation Officer, Africare/Ntungamo
Denis Nuwagaba, Behavior Change Communication Specialist, Africare/Ntungamo
Abdalla Meftuh, Country Representative, Africare/Uganda
Kendra B. Dibinga, Health Program Manager, Africare/Washington
Alan Alemian, Regional Director, East/West Anglophone, Africare/Washington

July 30, 2004

Acronyms

ABC	Abstain Be-faithful and use Condoms
ACDI-VOCA	Agricultural Cooperative Development International and Volunteers in Overseas Cooperative Assistance
ADRA	Adventist Development Relief Agency
AEFI	Adverse Effects Following Immunization
AICM	African International Christian Ministry
AIDS	Acquired Immune Deficiency Syndrome
AIM	AIDS Integrated Model Project
ARI	Acute Respiratory Infections
BASICS	Basic Support for Institutionalizing Child Survival
BCC	Behavior Change Communication
CATCH	Core Assessment Tool on Child Health
CBO	Community-based Organization
CCA	Community Counseling Aides
CCW	Child Care Workers
CDD	Control of Diarrhea Diseases
CHIS	Community Health Information System
CIMCI	Community-based Integrated Management of Childhood Illnesses
CMS	Commercial Marketing Strategies
CORE	Child Survival Collaborations and Resources Group
CORP	Community Owned Resource Persons
CSTS	Child Survival Technical Support Project
DDHS	Director of District Health Services
DENIVA	Development Network for Indigenous and Voluntary Associations
DHT	District Health Team
DIP	Detailed Implementation Plan
DISH	Delivery of Improved Services for Health
EDF	European Development Fund
EPI	Expanded Program on Immunization
FBOs	Faith Based Organizations
FM	Frequency Mode
GOU	Government of Uganda
HA	Health Assistants
HBMF	Home-Based Management of Fever
HC	Health Center
HIDN	Health Infectious Disease and Nutrition
HIV	Human Immune Deficiency Virus
HMIS	Health Management Information System
HSD	Health Sub-district
HUMC	Health Unit Management Committee
IDA	Iodine Deficiency Anemia
IEC	Information Education and Communication
IMCI	Integrated Management of Childhood Illnesses
IRS	Indoor Residual Spraying
ISA	Institutional Strengths Assessment
ITN	Insecticide Treated Nets

KPC	Knowledge Practices and Coverage Survey
LC	Local Council
LQAS	Lot Quality Assurance Sampling
MACIS	Malaria and Childhood Illness Secretariat
MCP	Malaria Control Program
MISR	Makerere Institute of Social Research
MO	Medical Officer
MoH	Ministry of Health
MTCT	Mother to Child Transmissions
MTE	Mid Term Evaluation
NDHS	Ntungamo District Health Services
NECDP	Nutrition and Early Childhood Development Project
NEMA	National Environment Management Authority
NGO	Non Governmental Organization
NMCP	National Malaria Control Program
NRC	Ntungamo Red Cross
NRM	Natural Resource Management
OR	Operations Research
ORS	Oral Re-hydration Salts
OTA	Out-patient Turn Up Assessment
PAF	Poverty Alleviation Fund
PCM	Pneumonia Case Management
PDC	Parish Development Committee
PLHA	People Living with HIV/AIDS
PLWA	People Living With AIDS
PME	Program Monitoring and Evaluation
PP	Private Practitioner
PPPH	Public Private Partnership for Health
PRA	Participatory Rural Appraisal
PSI	Population Services International
PTC	Post Test Club
PVO	Private Voluntary Organization
RBM	Roll Back Malaria
SARA	Support for Analysis and Research in Africa Project
SC	Sub-county
STI	Sexually Transmitted Infections
SWOT	Strengths Weaknesses Opportunities and Threats
TBAs	Traditional Birth Attendants
TH	Traditional Healer
TOT	Training of Trainers
TT	Tetanus Toxoid
UDHS	Uganda Demographic and Health Survey
UFSI	Uganda Food Security Initiative
UNEPI	Uganda National Expanded Program on Immunization
UNICEF	United Nations Children's Fund
URCS	Uganda Red Cross Society
USAID	United States Agency for International Development
US	United States

VCT	Voluntary Counseling and Testing
WHO	World Health Organization

TABLE OF CONTENTS

A. EXECUTIVE SUMMARY

In the Cost Extension category, Africare was awarded a grant of $1,299,999 from USAID/GH/HIDN's Child Survival and Health Grants Program (CSHGP) to support a 5-year extension of its **Community Based Integrated Management of Childhood Illness (CIMCI) Project in Ntungamo District of South Western Uganda.** The project will run from October 1, 2003 through September 30, 2008.

Phase I of the CIMCI project was instrumental in supporting the first steps of Uganda's central Ministry of Health (MOH) in the development of national CIMCI strategies and its subsequent scale up in the entire country. CIMCI-Plus will provide experience-based inputs to help build a national support network for CIMCI and to document and disseminate lessons learned to further build national capacity for its implementation.

Ntungamo's needs are great and growing. High infant and child mortality of 98 and 176/1,000 live births respectively characterize child health in the proposed extension area. This is attributed to high prevalence of malaria, diarrhea, malnutrition, and to a lesser degree, pneumonia. Immunization rates have recently fallen dramatically with only 38% of children 12-23 months fully vaccinated and only 18% of pregnant women covered for Tetanus Toxoid. HIV/AIDS prevalence is estimated to be higher than the national figure of 8.3%, and maternal mortality is estimated at 505/100,000 live births.

CIMCI-Plus will extend Africare's child survival work from the 8 sub-counties already served in the first phase, to the other 7 sub-counties of **Nyakyera, Ruhaama, Bwongyera, Ihunga, Kayonza, Rugarama and Itojo.**

CIMCI-Plus will reach 82,091 beneficiaries comprised of 39,180 children under five and 42,911 women of reproductive age. In addition, it will indirectly benefit an estimated 104,476 people. CIMCI-Plus will focus on five interventions: malaria (35%), immunization (25%), HIV/AIDS (15%), nutrition, micronutrients and breastfeeding (15%) and diarrhea (10%). Pneumonia case management will be addressed as part of the holistic CIMCI approach.

The goal of CIMCI-Plus is to reduce morbidity and mortality of children under five and improve the health status of women of reproductive age in the Ntungamo District, by the end of 2008. To reach this goal, CIMCI-Plus has 4 general objectives:

1. To promote knowledge and behaviors related to the prevention of childhood illnesses, at household and community levels;
2. To improve home management of the sick child by promoting timely and appropriate care seeking at the household and community levels;
3. To improve accessibility of under-five children and women of reproductive age to quality health services and products, both at facility and community levels; and
4. To strengthen national and district MOH capacity to replicate and sustain the community IMCI approach

CIMCI-Plus will build on the achievements and lessons learned from the first phase. New tools such as Lot Quality Assurance Survey (LQAS) and Institutional Strengths Assessment (ISA) will be applied and will provide an opportunity to consolidate the CIMCI model, based on the

CORE/BASICS Community H/H IMCI Framework**.** The framework has three elements and builds on strong multi-sectoral platform.

Under Element 1, linkages will be strengthened through outreach services; a facility-supported community health information system; participation of health facility staff in behavior change and communication (BCC) activities; and improvement of facility services provided to the mother and child.

Under Element 2, community services will be expanded with focus on quality of services provided by shopkeepers and traditional birth attendants (TBAs). Commodities including anti-malaria drugs, bed nets and condoms will be more accessible.

Under Element 3, behaviors and appropriate care seeking will be improved through innovative BCC approaches that involve community drama, demonstration, referral and home visiting.

Using matching funds, CIMCI-Plus will continue to expand multi-sectoral platform activities of water and sanitation, vegetable gardens, aquaculture and animal husbandry.

During CIMCI phase I, Africare studied and quantified the immediate effect of CIMCI on facility utilization, revealing an increase of 97%. CIMCI-Plus will provide an excellent opportunity to monitor this effect over time and for projecting facility and other needs. CIMCI-Plus will look at qualitative factors influencing care-seeking patterns for dangerous practices such as "Oburo" (*millet*[1])and "Ebiino"[2] (*too*th extraction), from client and traditional healer perspectives, for the development of BCC strategies to address these practices. Results from operations research efforts will be shared with local partners during review meetings, with the central MOH and national NGOs. Africare will also disseminate this information in CORE meetings nationally and internationally.

CIMCI-Plus is consistent with USAID/Uganda strategic objectives and intermediate results. It has strong support from the Government of Uganda, national and local partners, including Ntungamo District Health Services, health sub-district personnel, facilities and sub-counties. Throughout the development and preparation of the detailed implementation plan, starting in October 2003, Africare consulted and involved the aforementioned national and district level partners.

The Ministry of Health has embraced the Ntungamo CIMCI project as their model project for implementing IMCI component 3 and also made Ntungamo a priority district for IMCI components 1 and 2. To ensure sustainability, CIMCI-Plus will partner with the MOH and other partners including Development Network for Indigenous Voluntary Associations (DENIVA) and Uganda Red Cross Society (URCS) to create a united front of CIMCI advocates to promote the child survival agenda.

Dr. Jessica Kafuko, Project Management Specialist of the USAID Mission in Kampala, was consulted during the design of the DIP. The primary authors of the detailed implementation

[1] *Millet disease is a folk disease, which attacks the child's chest. Treatment is done by extracting or cutting the chest skin to remove the millet-like nodules. This often results into death of the child.*

[2] *Ebiino is a folk disease that is perceived to be caused by maggots inside the child's gum causing the child irritation thus diarrhea. As a method of treatment, the maggots are extracted from the gum using sharp materials. This disease normally occurs during the normal teething of the child which mothers confuse with maggots.*

plan are Robert Mwesigwa Program Coordinator (Ntungamo); Atukunda Innocent, Research/Monitoring and Evaluation Officer (Ntungamo); Denis Nuwagaba, Behavior Change Communication Specialist (Ntungamo); Abdalla Meftuh, Africare Country Representative (Kampala); Kendra B. Dibinga, Health Programs Manager (HQ); and Alan Alemian (HQ). The contact person at Africare/Washington, D.C. for the CIMCI-Plus Project is Alan Alemian, East/West Anglophone Regional Director.

B. CSHGP DATA FORM

Please see annex 6 for the information on the CIMCI Project and the Rapid Catch Indicators.

C. DIP PREPARATION PROCESS AND START-UP ACTIVITIES

The DIP is a result of concerted efforts by Africare and key partners. CIMCI-Plus initiated a participatory process of DIP preparation in October 2003 that began with establishing effective partnerships with a plethora of stakeholders to create a common vision and strengthen partner links. Partners that were consulted include: the Ntungamo District Health Team, District and Sub-county leaders, Community Resource Persons (CORPs), USAID Mission, the IMCI Unit of the Ministry of Health, Makerere Institute of Social Research (MISR) and partner NGOs. The DIP was developed in line with CIMCI national policy and implementation guidelines and CSTS technical reference materials.

Start-up activities carried out to date include: (1) Negotiation and signing of the CIMCI-Plus memorandum of understanding with Ntungamo District Local Government **(Annex 4)**; (2) Conduct and analysis of a baseline KPC survey to guide program priorities, strategies and setting of specific objectives and indicators; (3) Assessment of existing community structures: Community Resource Persons (CORPs), parish development committees (PDCs), child care workers (CCWs), traditional birth attendants (TBAs), women groups and drama clubs in the target sub-counties; (4) A two-day district and national stakeholders' workshop to review and set end-of-project targets and indicators; (5) Recruitment, orientation and posting of field staff in the sub-counties who continue introducing the program and guide communities to draw up resource maps, oriented five community drama groups about the 16 key household behaviors and are actively involved in immunization revitalization activities; (6) Five stakeholders' sensitization workshops to introduce CIMCI and to discuss their roles and responsibilities were held in five sub-counties reaching over 350 community leaders and resource persons; (7) Commencement of a new complimentary community-based integrated management of natural resources and HIV/AIDS project[3] in Nyakyera and Itojo sub-counties; and (7) Presentation of a paper on the multi sectoral approach at a CORE-organized workshop in Washington, D.C. of the approaches, lessons and experiences of CIMCI at the national level.
+
CIMCI-Plus will continue consultative meetings with district and national level partners through information sharing, continued discussion of roles and responsibilities and organizing quarterly review meetings during implementation of planed activities.

D. REVISIONS (FROM THE ORIGINAL APPLICATION)

[3] *Africare received $120,000 grant under the Environmental Conservation Trust of Uganda (ECOTRUST) mechanism of the USAID Mission for 18 months (beginning January 2004) for a Community-based Integrated Management of Natural Resources and HIV/AIDS project. To-date, the project has constructed six shallow wells, two spring tanks, thirty-energy saving cooking stoves and one-water tank.*

There are no any changes on the original application including the budget. The five project interventions, immunization, malaria control, diarrhea control, nutrition, breastfeeding and micronutrients and HIV/AIDS, remain the focus of CIMCI-Plus.

E. DETAILED IMPLEMENTATION PLAN

1. Summary of Baseline and Other Assessments

Types and Methodology of Baseline Assessments: CIMCI-Plus conducted a baseline KPC survey in January 2004. It utilized the KPC 2000+ tool, which was adapted to program interventions. CATCH indicators were also incorporated. The WHO/EPI 30 cluster sampling technique was used. The population and the number of households were obtained from the 2002 Uganda Population and Housing Census. 304 mothers with young children under five years were interviewed. Two index children were considered i.e. the youngest and the oldest among the under fives. The survey instrument was pre-tested in non-intervention sub-counties before actual data collection.

The survey was carried out in all seven CIMCI-Plus intervention sub-counties. Fourteen enumerators and two supervisors selected from the District Health Services were trained over a three-day period. Each enumerator administered an average of seven questionnaires per day. Refer to detailed survey report in **Annex 3**.

Qualitative data were collected to supplement the KPC survey data. The data were collected through focus group discussions with mothers of children under five years. One focus group discussion was conducted in each of CIMCI-plus sub-counties.

Baseline Findings Summarized

A total of 304 mothers were interviewed. 48.9% of the mothers were in 25-34 years age bracket while 32% were less than 24 years and 17%, in the 35- 44 years group. The average age of the mothers was 28 years. 64% reported that they could read and write in vernacular (Runyankore/Rukiga), while 36% could not read or write. 90% reported they were married. 84% of the mothers were engaged in income generating activities. 63% of the mothers were working away from home and of these, 67% took their children with them to the place of work. A total of 475 children under five years were found in the 304 households. The average number of children per household was two. Of these, 49.7% were males while 50.3% were females. 22% of the index children were aged 12-23 months and 20% in the 36-47 months age group.

Salient findings related to nutrition, micronutrient and breastfeeding were as follows: 48% of children 0-6 months were exclusively breast fed at the time of the survey. 30% of the mothers said that they stopped breastfeeding their children at the age of 12-23 months while 24% continued breastfeeding the children beyond 24 months. 61% breastfed their children within one hour after delivery. 69% of the mothers reported that a breastfeeding child should be given additional food at the age of six months. 75.6% of children 6-59 months were being fed on Vitamin A rich foods.

Focus group discussions with mothers revealed that mothers often give water to newborn babies before initiating breastfeeding. The explanation given is that mothers take some time to produce breast milk after delivery. Mothers sometimes start giving children additional foods early

because the children demand for food when they are still young. Even if they are breastfed many times in a day, they do not get satisfied.

Salient findings related to Diarrheal diseases were as follows: 18% of the children had had diarrhea in the two weeks preceding the survey. Only 7.8% of children <60 months with diarrhea were treated with ORS at home. 10% of the children who had diarrhea in the two weeks preceding the survey were breastfed more than usual while 27% were breastfed less than usual. 39% of the children were given more fluids than usual while 18% received less than usual. 43% of the children were given the same mount of fluids. 26% of the children who had diarrhea and had already started eating some food, were reported to have received more food than usual while 41% had received the usual amount of food. The households with designated hand washing facilities with soap/ash present that mentioned the importance of washing hands after defecation to prevent diarrhea were only 4%. 41.2% of children <60 months were taken for false teeth extraction. 65.4 % of the children who had diarrhea in the two weeks preceding the survey received treatment from home while 34.6% were taken outside the home for treatment. Of the children who received treatment from home, 74.5% were given herbal treatment and only 25.5% got anti-diarrheal/antibiotics treatment. Treatment sought outside home was from government health facilities/clinics (49%), drug shops (34%), private physicians (6%) and government hospitals (43%)**.** Other perceived causes of diarrhea that featured in the discussions were breast-feeding a child when the mother is pregnant, *false teeth (ebiino)* and the development of the normal teeth. Diarrhea was also associated with inhaling wind and worms. It emerged from the discussions that mothers commonly give local herbs (chewed and orally administered) to children with diarrhea.

Salient findings related to Immunization were as follows: 58% of the mothers had vaccination records for their children. 54 (45%) out of 120 who had the vaccination records had no date indicated as to when the child received the measles vaccine. 65% of children 12-23 months of age received BCG before their first birthday. 62.4% of children 12-23 months had received OPV3 before their first birthday. 61.4% of the same age group received DPT3. 55.4% of children 6-23 months received measles vaccine. 42% reported that the children had received polio drops up to 2 times and 30.2% had received 3 drops. Mothers who received at two tetanus toxoid injections before the birth of their youngest child were 20.4%. Discussions with mothers indicated that they had little knowledge about the two recently added immunizable diseases of haemophilus influenza and Hepatitis B.

Some of the factors mentioned that discourage participation of mothers in immunization of their children included; side effects such as children developing fevers, misconceptions about safety of vaccines, health workers failing to maintain outreach schedules and long distances to immunization centers.

Salient findings related to malaria were as follows: The baseline survey results show that 29.3% of the children had fever in the two weeks preceding the survey. 14.4 % of children < 60 months were sleeping under insecticide treated nets. 67.8% of children 6-59 months with fever were given same or more solid/mashed foods. Out of the 50 children who had fever and were breastfeeding, 22% were breastfed more than usual, 46% received the same as usual and 20% were breastfed less than usual. Out of 122 children that had fever, 51.6% received treatment at home before seeking treatment outside home. Only 6.3% of mothers with children <60 months reported giving Chloroquine and Fansidar (SP) to febrile children at home. 12.2% of children <60 months were taken for millet extraction. 49.8% of mothers took anti-malarial drugs during

the last pregnancy to prevent malaria. Sources of treatment for fever outside home constituted drug shops (37%), government health facility/clinic (32%) and private physicians. Results from the focus group discussions reveal that the first action mothers take when their children fall sick is taken at home involving both western and local therapy.

Salient findings related to HIV/AIDS are as follows: All the mothers had heard about HIV/AIDS. The commonly mentioned symptoms associated with HIV/AIDS were loss of weight (68%), skin rash (47%), persistent fever (16%), diarrhea (16%) and cough (30%). The common ways of avoiding HIV/AIDS mentioned were abstinence (84%), use of condom (54%), having sex with only one partner (31%). Mothers with children <60 months who cited that HIV/AIDS can transmitted from mother to child during pregnancy, delivery and breast feeding were 36.2%. Only 6% of the mothers said they had ever tested for HIV.

During discussions with mothers, it was reported that some people are not willing to go for HIV test because they think that when they get to know they are HIV positive, they will die quickly. Some mothers also said it is not good to test for HIV because when people learn that they are positive, they can squander their property thus leaving nothing for the children.

Care Seeking Behaviors: Mothers consult neighbors (59%), mother in-law (37.3%), medical doctors (22%) and community health workers (26%). The conditions mentioned by the mothers that prompt them to take a child immediately to a health facility were fever (71%), child becomes sicker (38%), not able to breast feed or drink (20%), fast breathing (15%), drinking poorly (15%) and vomiting (12%). Only 19% of the mothers reported that they take the child to a health facility immediately they recognize that the child is ill. The major factors mentioned by mothers that hinder utilization of health services were financial (64.9%) and long distance (10.6%). 62% of the mothers interviewed live within less than five kilometers from a health unit. 38% of the mothers move five or more kilometers to the health facilities.

Comparison of Baseline Findings with Country Context[4]

The 2001 Uganda Demographic and Health Survey (UDHS) estimates current infant and child mortality at 88 and 152/1,000 live births, respectively, and the maternal mortality rate at 505 maternal deaths per 100,000 live births. Located in the Western Region, Ntungamo health indicators are worse than the national average. UDHS estimates that infant and child mortality of the Region is 98 and 176/1,000 live births respectively. These are grossly under-reported in the district due to weak births/deaths registration. The district Health Management Information Systems (HMIS) recorded only 77 deaths of under-five, during 2001. Though disease-specific mortality for Ntungamo District is not available, major morbidity causes for children under five include malaria, diarrhea, malnutrition and acute respiratory illnesses.

According to the 2001 Roll Back Malaria (RBM) baseline assessment in the four districts of Apac, Tororo, Mubende and Kabale (neighboring Ntungamo District), between 39% and 44% of recorded outpatient visits were due to malaria. It is estimated that between 70,000 and 100,000 people die from malaria each year, the great majority of them being children under five years. However, management of malaria fevers is still poor: only 28% of those patients seen at a health

[4] *This section presents data from various sources. There seems to be some discrepancies in data between various studies. This is partly on one hand, due to much data that is aggregated especially at the national level leaving out details that could be useful for comparison; and due to different studies which adapt and use different tools in data collection and analysis on the other hand. However, the disparities have no significant negative impact on the picture being described in this document.*

facility were managed correctly and only 7% of caretakers of children under-five years sought treatment within 24 hours. According to the 2001 Ntungamo District records, 46% of children attended government facilities with malaria. In CIMCI Plus baseline, 29.3% of children under five were reported with fever, during the two weeks prior to the survey.

The 2001 UDHS revealed that only 13% of households in Uganda had mosquito nets. The survey further showed that mosquito nets are less likely to be available in households in the western region than in other regions (6% compared to 15%). Eighteen percent of children under-five who live with their mothers sleep under a net and 7% slept under a net the night before the survey. As mosquito nets are less likely to be available in the western region children in this region are also less likely to sleep under a net.

The 2003 Family Care Practices study by UNICEF found bed net use among children in Uganda to be very low with only 20% of children below 24 months of age slept under a mosquito net the night before the interview. In comparison, the Ntungamo CIMCI-Plus KPC baseline survey indicated that only 14.4 % of children < 60 months were sleeping under insecticide treated nets. Whereas district records indicated that at least 46% of children were taken to a government facility, CIMCI-Plus Survey found only 32% of children with malaria were taken to a government health facility/clinic.

Irrational drug use poses a problem in treatment of acute respiratory infections (ARI). Project experience indicates common confusion among fever, malaria and ARI. As with diarrhea, some ARI episodes are diagnosed as *millet* disease and are referred to traditional healers.

The proportion of children who are fully immunized in Uganda has been dropping since 1995, from 47% in 1995 to only 37% in 2001. Most children (84%) receive one round of immunizations, but only 37% receive all five rounds. As many as 63% of mothers do not know when their child needs his or her next immunizations (MOH 2003). The 2001 UDHS found that 29% of children are fully immunized by 12 months of age as recommended. Thirteen percent of children 12-23 months had not received any of the recommended vaccines. The results also show that the drop out rate for DPT is 40% and the rate for polio was 36%. The immunization coverage in Uganda is reported to be 47.4% of the 12-23 months age group. There is significant drop out between the first and third doses of DPT and polio of 25% and 28%, respectively. Only 60% of children 12-23 months old receive measles vaccine while 45% receive the vaccine before their first birthday. Using both history and card, the 2003 UNICEF study on family care practices 76%-100% of children had BCG vaccination, 38%-74% had DPT3 vaccination and only 26-50% had measles vaccination within the first year across the districts.

In 1998 and 1999, UNEPI carried out a series of reviews and studies, which revealed serious gaps in knowledge and practice, areas that are critical for delivery of quality immunization services in all the districts. These areas include; EPI target diseases, EPI vaccines, Cold Chain, Injection Safety, organizing immunization sessions, screening and registration of clients, preparing vaccines during the session, giving immunizations social mobilization, Vitamin A supplementation, After session and monitoring immunization coverage.

The Ntungamo District Health report (2001-2002) indicates that immunization coverage dramatically decreased during the period from 1996 to 2000 reaching 69% for BCG, 54% for DPT3, 56% for Polio, 49% for Measles with an estimated 38% of children 12-23 months fully vaccinated. Maternal coverage for TT is reported at only 18%. CIMCI -Plus KPC baseline

survey indicated that of children 12-23 months 65% had received BCG before their first birthday, 62.4% received OPV3, 61.4% received DPT3, which is relatively low. Several elements contributed to the decline in immunization coverage, in recent years. The local FM radios broadcast unsubstantiated messages related to side effects of vaccines, leading many mothers to stop taking children for immunization. Because physical accessibility to facilities is limited, many caretakers rely on outreach vaccination sessions; but health workers do not consistently follow the immunization schedule. At the health facility level, immunization sessions are short and not integrated with antenatal care. Also mothers fear that the vaccines may be contaminated with HIV/AIDS, lameness, sickness, and death after immunization especially by injection.

The 2001 UDHS found a higher prevalence of 20% of children under- five years having had diarrhea in the last two weeks before the survey. The prevalence of diarrhea was highest among children aged 6-11 months (38%). The risk of diarrhea decreases as the child grows, thus the lowest level was found among children 48-59 months (8%). The UDHS found that nine in ten mothers (92%) knew about the use of ORS packets for treating diarrhea. In the Uganda National Household Survey it is indicated that Oral Re-hydration Salts (ORS) seems to be used more in central and eastern regions than in other regions. The same survey revealed that 45 % of children who had diarrhea in the two weeks preceding the survey were taken to a health facility for treatment. According to the findings of the 2001 UDHS only 28% of the children who had diarrhea in the two weeks preceding the survey were given more fluids than usual, while 31% were given the same amount of fluids. Four in ten children with diarrhea were given less fluid or non at all. Only 5 percent of the children were given more food than usual, while 51 percent were given less food or non at all.

The family care practices study by UNICEF conducted in 2003 found that only 41% of children on exclusive breastfeeding had breastfeeds increased during a diarrhea episode. Among children on complementary feeding, 40% had increased amounts of drinks and 24% had increased amounts of foods. ORS was given in 64% of children with diarrhea; home made recommended fluids to 56% and salt/water solution to 16%.

The 2001 UDHS found that water was available in 14% of the households surveyed, soap in 10% of the households and a basin in 17% of the households. Only 4% of the households had all the three hand washing materials. CIMCI plus KPC survey revealed the same percentage (4%)

According to CIMCI-Plus baseline KPC, 18% of children had diarrhea in the last two weeks. Only 34.6 % of diarrhea cases come to the facility. Most children with diarrhea are treated with traditional herbs (74.5%), ORS (7.8%), and commercial anti-diarrheal treatments including antibiotics (25.5%). 41.2% cases are attributed to 'false teeth' (*Ebiino*) and referred to a TH for tooth extraction. Health and hygiene practices are deficient due to lack of water and sanitation facilities.

The 2000/01 Uganda Demographic and Health Survey (UDHS) indicated that stunting in Uganda was quite prevalent. Stunting prevalence stands at 39%. Fifteen percent are severely stunted. The prevalence of stunting is lower among children under six months and increases with age. The highest prevalence (5) is among children aged 16-23 months. Stunting is more prevalent in rural areas, in Western Uganda and among children whose mothers have had no education.

Wasting was found to be more prevalent among children 10-11 months (11%) corresponding with when complementary feeds have just been introduced. According to the WHO prevalence data of 1998, it is estimated that the prevalence of iron deficiency anemia (IDA) in Uganda is slightly above 50%. About 30% of maternal deaths are believed to be due to anemia, the majority of which is attributable to IDA.

The UNICEF Family Care Practices study in Uganda show that 59% of the children under two years were initiated on breast milk within the first hour of birth. Between 33-76% of children 0-6 months are exclusively breastfed. 64% of children start feeding on complementary foods by five months while continuing to breastfeed. By 20-23 months of age, only 29% are still breastfeeding.

The 2001 UDHS shows that about one third of the babies are put to the breast within one hour of birth, while 86% initiate breast feeding in the first day of life. Two in three children younger than six months are exclusively breast-fed; the proportion among children 6-9 months is only 9%.

In the Western region where Ntungamo is located, the UDHS estimates that 48% of children under four are stunted, the highest proportion in the country. By UDHS estimates, more than 55% of children suffer from anemia and around 29% suffer from Vitamin A deficiency. Many caretakers are unwilling to administer colostrum. Protein rich foods such as rabbit meat are affordable, but not culturally accepted in some communities. Lack of access to immunization also affects uptake of Vitamin A supplements.

In 2000, among those that tested for HIV/AIDS at two testing sites in Ntungamo, 20.7% to 22.6% were found positive. Prevalence was higher among the older groups and among females. However, these percentages are likely to be much higher. Only three health facilities are conducting VCT services (Kitwe, Rwashamaire and Itojo health units). More recent figures from these sites reveal a high positivity rate of 16.4% among clients who tested. This is exceptionally high compared to recently declared national figures of about 6.1%. In addition, HIVAIDS infection among infants in Uganda has increased from 88 to 300 out of 1000 live births per year. (WHO Country Annual Report) The 2001 UDHS shows that only three methods to avoid infection with HIV/AIDS are widely known, namely, using condoms (spontaneously mentioned by 54% of women and 72% of men), abstaining from sexual relations (50% of women and 65% of men), and having only one sexual partner (49% of women and 43% of men). A sizeable proportion of respondents (14% of women and 5% of men) know that AIDS can be avoided but do not know a particular method to avoid contracting. Thirteen percent of women and 5 percent of men either believe that there is no way to avoid AIDS or do not know whether AIDS can be avoided. According to baseline surveys in the proposed program area, as many as 36.3% of the population does not know that AIDS can be transmitted from mother to child – almost four times the national figure of 11%.

According to the 2003 UNICEF study, the commonly used practices of protection by mothers against HIV/AIDS were faithfulness (48%), use of condoms (24%), abstinence (13%) and avoiding sharing sharp objects (10%). Qualitative results indicate that women caregivers have little information on effective HIV prevention measures. Fifty one percent of the mothers did not know where to take an HIV/AIDS test. Sixty seven percent of the mothers were willing to have an HIV/AIDS test and to disclose the results to an immediate family member.

Knowledge related to transmission of HIV/AIDS from mother to child is far from satisfactory in Ntungamo. Only 66.9% and 56.1% of mothers knew that HIV/AIDS could be transmitted from mother to child during pregnancy and breastfeeding respectively. Stigma associated with HIV/AIDS is widespread, making it hard to seek counseling, particularly for pregnant women. Use of condoms with a non-regular partner is lower in women (38%) than in men (59%), reflecting the greater role men play in deciding condom use. The community-accepted norm is abstinence prior to marriage. This makes it socially difficult for youth to seek condoms and/or services related to sexually transmitted diseases.

Constraints to Achieving Program Objectives

Major constraints envisioned during the implementation of CIMCI-Plus include: (1) Low revenue base of Ntungamo District and inadequate resources for local NGOs/CBOs to complement the role of Africare. Africare and the District will build NGOs/CBOs' capacity in program development, resource mobilization and linkages with the donor community; (2) Cultural taboos and practices that could be overcome through health education; (3) As Behavior Change Communication efforts expand, increased demand for quality services may stretch the resource capability of District health facilities leading to drug stock outs and inadequate supply of insecticide treated nets (ITNs). As in CIMCI phase I, Africare will work with the Ntungamo District Health Services to project and plan for increased demand, so that required resources are allocated; (4) Motivating community structures and change agents, such as PDCs, CORPs and TBAs, is always a challenge, since those who volunteer time and labor also must handle their own daily chores. As during CIMCI phase I, CIMCI-Plus will use non-monetary incentives such as badges, pins, calendars, t-shirts and bed net samples to reward and encourage good performances; (5) Communities sustaining the project though possible is challenging. As in CIMCI phase I, the project will encourage the sub-counties to integrate key project activities in their development plans and budgets to organize refresher courses for community resource persons to share new information and experiences, support supervision of the structures and water source maintenance; (6) Building CIMCI-related capacity of community structures like PDCs can be time consuming, even causing implementation delays in some communities. Under CIMCI-Plus, the program will continue to establish a cadre of district and sub-county trainers, allowing for parallel (as opposed to sequential) training, which will improve the timely initiation of activities in all target communities; and (6) Staff turnover at health facilities may result in attrition of IMCI case management skills provided in the past. The commitment of the District and the Ministry of Health to CIMCI-Plus will allow continuing mobilization of resources to support IMCI case management training to new staff.

Most up-to-date Coverage estimates in Service Area

The most up-to-date coverage estimates were derived from the CIMCI-Plus KPC baseline survey that was conducted in January 2004. Please refer to baseline survey report in **Annex 3 and the section on Baseline Findings Summarized.**

Most Recent Disease Surveillance Data for Program Area

On a weekly basis, the Epidemiological Department of the Ugandan MOH, compiles a report on notifiable diseases of epidemic potential which include acute flaccid paralysis, suspected rabies, cholera, dysentery, guinea worm, malaria, measles, meningitis, neonatal tetanus, plague, typhoid fever and sleeping sickness in the 56 districts constituting Uganda, including Ntungamo. The

data is presented every Monday, in the daily newspaper, *The New Vision*. For example, the report for the week ending July 4, 2004, in Ntungamo District, 4,701 cases of malaria and 4 deaths due to malaria were reported. Also, 11 cases of animal bite (suspected rabies) were reported.

On the quality of data, national and Ntungamo district staff are carefully selected, trained and provided with manuals (Training Modules on Integrated Disease Surveillance and Response for Health workers) as well as support supervision. There is an efficient radio call communication network between the MOH, DDHS office and HSD levels that help in collecting most up to date information, which is shared with relevant departments at the MOH level for action. On completeness of reporting, Ntungamo District is among the best districts with coverage of health units that report ranging from 80-100%. The surveillance system captures only data on government facilities.

Ministry of Health Policies, Strategies and/or Case Management Policies or Current Services

To address the challenges facing Uganda, the MOH developed a Health Sector Strategic Plan (2000/01 – 2004/05) whose goals are to: (a) Increase access to the Uganda National Minimum health care package[5], with special attention to access for the poor, difficult to reach and disadvantaged; (b) Improve quality; (c) Reduce inequities related to accessibility of services; (d) Recruit, train and rationally deploy and motivate qualified staff; (e) Rehabilitate current structures and building new structures for underserved populations; (f) mobilize communities and encourage participation; and (g) Improve coordination and management of resources.

Malaria: The Malaria Control Program (MCP) has four main intervention strategies: case management, vector control, intermittent presumptive treatment of pregnant women and epidemic preparedness and response.

Case management policy as provided for treatment of malaria is underlined by the Home-Based Management of Fever (HBMF) whereby home based presumptive treatment for all fevers with unit dose of pre- packs of anti-malarial drugs for under-fives is recommended. The MCP has launched a serious campaign code named HOMAPAK to promote management of malaria using a combination of chloroquine and sulphadoxine-pyrimethamine (CQ/SP). There are specific red packets for children between 2 months and two years and green packets for children aged 2 to 5 years. Caretakers are expected to treat all children presenting with fevers with the anti-malarials within 24 hours of onset.

According to the 2002 anti-malarial drug policy, SP and Chloroquine taken in combination form the first line treatment. The second line anti-malarial drug is quinine tablets. Still, with severe malaria the recommended treatment is quinine injection. As per the policy guidelines, the second line treatment should only be given when first line treatment of SP and chloroquine have failed or is contra-indicated. This includes a child presenting with uncomplicated malaria who has taken HOMAPAK before coming to the health facility. If the patient has severe malaria, an initial dose of quinine IM should be given and then the patient referred immediately. If the

[5] The minimum health package includes (1) Control of communicable diseases; (2) Integrated management of childhood illnesses; (3) Sexual and reproductive health and rights; (4) Environmental health; (5) Health education and promotion; (6) School health; (7) Epidemic and disaster prevention, preparedness and responses; (8) Improving nutrition; (9) Interventions against diseases targeted for elimination or eradication; (10) Strengthening mental health services; and (11) Essential clinical care.

patient has signs of severe malaria and presents at a health center with admission, laboratory and IV infusion facilities, they should be treated according to the guidelines of diagnosis and management of severe malaria.

All pregnant women are expected to receive two doses of SP as intermittent presumptive treatment of malaria: one in the second trimester and one in the third trimester as part of the antenatal care package. The strategy is to be scaled up by integrating it into maternal services at both facility and community levels and creating demand for the services.

The key interventions under vector control are the promotion of insecticide treated nets (ITNs) and indoor residual spraying (IRS). ITNs are currently considered the most effective method of malaria prevention in highly endemic areas. While children under five are the primary target, other vulnerable groups including pregnant mothers are encouraged to acquire and use ITNs. The promotion of ITN use is implemented through a public-private approach. Major implementers include NGOs, the commercial and public sectors.

The MCP instituted activities to check epidemics principally in three distinct phases namely before, during and after the epidemic. Before the epidemic, some activities such as community mobilization, health education and monitoring of malaria cases at health facilities are undertaken to prepare communities. During epidemics the MCP ensures prompt mobilization and distribution of resources, swift sharing of information, and easy mobility of patients to treatment centers. After the epidemic, MCP reviews its experiences with the contained epidemic so as to document and use them in the future.

HIV/AIDS: Policies that address HIV/AIDS care, prevention and control in Uganda follow. (1) *HIV/AIDS Policy of 1999*. This includes prevention and control of STI/HIV through a program of intensive IEC aimed at promoting responsible sexual and reproductive behavior, sexual and reproductive counseling, HIV counseling and testing, wide use of condoms, prompt treatment of STIs, universal blood safety, reduction of mother to child transmission, palliative care, promotion of community involvement in the care of patients with AIDS and mitigation of socio-economic impact of the epidemic will constitute the core elements of this component. (2) *Policy Guidelines on Feeding of Infants and Young Children in the Context of HIV/AIDS:* These guidelines address key issues regarding infant feeding in the context of HIV/AIDS. (3) *The policy for Reduction of the Mother-to-Child HIV Transmission:* This policy addresses key issues related to prevention of mother to child transmission (MTCT) of HIV including anti retroviral therapy; voluntary counseling and testing (VCT); infant feeding; support for mothers and infants and other interventions for reduction of MTCT.

The HIV/AIDS policies and interventions have greatly contributed to the control and possible reduction of HIV in Uganda. With the advent of major advances in anti retroviral therapy and research of HIV vaccines still in infancy stage, Government cautiously initiated a pilot project o make available anti retroviral drugs in the country in 1998.

Diarrhea: With the advent of IMCI, the current recommended treatment practices are based on the Ministry of Health National IMCI Treatment Guidelines. The IMCI algorithm describes how to assess and classify sick children with signs of diarrhea.

Immunization: The Uganda National Expanded Programme on Immunization (UNEPI) was established in 1983 with the main objective of making immunization integral to other primary

health care services in an effort to reduce morbidity, disability and mortality caused by the targeted immunisable diseases. These diseases at the time included tuberculosis, whooping cough, diphtheria, poliomyelitis, neonatal tetanus and measles. Hepatitis B and Haemophilus influenza type B were included among the target in 2002. The UNEPI was developed within the context of the provisions of the Health Sector Strategic Plan and the National Health Policy, which are in turn guided by the provisions of the Constitution of the Republic of Uganda (1995), and the Local Governments Act (1997).

The broad strategies of UNEPI include: (1) Revitalization of routine immunization as the primary focus of the program; (2) Conducting supplemental immunization activities against targeted diseases; (3) Improving communication skills among health workers to enable them communicate effectively to parents, guardians, caretakers, policy makers, politicians and other leaders; (4) Provision and maintenance of an effective cold chain and logistics system at all levels; (5) Strengthening technical and administrative support supervision and guiding the provision of pre-service and on the job training; (6) Strengthening partnership with other child health promoting programs, agencies, NGOs, religious organizations, and the private sector in service delivery and social mobilization; (7) Enhancing advocacy, social mobilization and health education; (8) Ensuring constant supply of Auto disabling Syringes and needles (ADS) and safe disposal of all medical wastes; (9) Strengthening and maintaining a surveillance system of immunisable diseases with particular focus to neonatal tetanus, poliomyelitis and measles using the Integrated Diseases Surveillance (IDS) approach; (10) Promoting monitoring, investigation and management of adverse events following immunization (AEFI); (11) Adopting and using internationally recommended approaches and guidelines that are relevant to Uganda and;(12) implementing other innovative strategies that will benefit the unreachable.

The immunization schedule begins at birth with BCG and polio and ends at 9 months with a dose of measles antigen. By the first birthday each infant needs to have completed all the doses. All women in childbearing age need to complete five doses of tetanus toxoid for full protection against maternal and neo-natal tetanus.

The targeted age groups for UNEPI are 0-11 months and all women of childbearing age (15-45 years) both pregnant and non-pregnant. All other un-immunized children below five years are also eligible for vaccination. Booster doses may be given as recommended by the Ministry of Health to children at five years or more at school entry and in post primary institutions.

Supplementary immunization doses may be given to specified target groups in accordance with the national, regional or global goals to control/eliminate maternal, neonatal tetanus and measles, or eradicate poliomyelitis. The target groups for supplemental immunization are determined according to the epidemiological pattern of the disease in the country.

Nutrition, Micronutrients and Breastfeeding: The nutritional status of the population, particularly children and women is poor and has been identified as a major health problem in Uganda. The department of community health recommends a multi-sectoral approach in implementation of strategies to improve the nutritional status of the population. The MOH guidelines on breastfeeding recommend that children be breastfed within the first 30 minutes of delivery and be exclusively breastfeed for six months, introduce supplementary feeding and continue breastfeeding up to 23 months. Breastfeeding is part of national IMCI algorithm, which health workers follow when counseling mothers.

The current recommended treatment practices are based on the Ministry of Health's National IMCI Treatment Guidelines. The IMCI algorithm describes how to assess and classify sick children with signs of malnutrition and anemia including counseling the mothers on child's feeding. At present interventions for prevention of anemia particularly among pregnant women include: (1) encouraging them to attend antenatal care at least four times during which they receive iron and folic acid tablets to boost their hemoglobin during pregnancy; and (2) women undergo physical and laboratory examinations to assess the levels of hemoglobin during pregnancy.

Overall Quality of Existing Services

The major provider of health services in the district is the Ntungamo District Health Services (NDHS). The District Health Team (DHT), chaired by the Director for Health Services, provides the overall coordination of health services in the district. The Ntungamo DHT benefited from the Project in terms of quality supervision, monitoring and evaluation and development of linkages between communities and the health system. Within Uganda's decentralized system, the sub-county level is involved in planning of health services, and holds a local health budget that can be tapped for CIMCI initiatives. District Council led by the District Chairperson draws up district policies and oversees quality of services. The district council was key in advocating for resources, mobilizing communities in the original 8 Project sub-counties and during the signing of the CIMCI-Plus MOU, the Ntungamo local government re-affirmed their commitment and support.

The entire district is served by 10 government-employed medical doctors, 2 of whom are in administration, 15 clinical officers, 3 registered nurses, 63 enrolled nurses and 28 enrolled midwives. About 37% of these providers have case management training in IMCI. 113 nursing assistants/aides, whose knowledge and skills come mainly from informal on the job training, constitute half (49%) of all providers. The 14 Health Assistants (HA) based at facilities, provide community support and health education on an ad-hoc basis. However, the 12 dispensaries in the proposed CIMCI-Plus extension area are served by only 2 clinical officers, 14 enrolled nurses, 5 enrolled midwives, 29 nurse assistants, and 7 health assistants. There are nationally developed standard guidelines used by health workers for case management of illnesses among the children.

A district hospital became available to the district only in 2001 when Itojo sub-county joined the district. The hospital is in a debilitated condition and lacks clean water supply. The district using the Poverty Alleviation Fund (PAF) and the Ministry of Lands, Water and Environment has started work on a gravity flow scheme to address the water issue. Three referral health centers and 12 dispensaries provide services in the proposed CIMCI-Plus extension. Child health activities at these facilities are primarily curative. Preventive services are limited to immunizations, some prenatal care and family planning. IEC activities are very limited in these facilities. All services are provided free after the elimination of the cost share provision in 2001. Some Health Unit Management Committees (HUMC) established to help in management of cost-share funds and strengthen the relationship between communities with health facilities are no longer very functional except at health sub-district (HSD) level. Facilities are under staffed and there is a shortage of drugs. In an attempt to improve the situation, under phase I the project conducted an outpatient assessment (OTA) study, results of which were shared with DHT and local policy makers leading to 10% increment on drug allocation budget. In addition more health staff were recruited and re-allocated to handle work overload.

The existing HIV/AIDS services include: VCT at four centers in the District, PMTCT has just been initiated at four centers that include: Itojo Hospital, Kitwe, Rwashamaire and Rubaare mini-hospitals and are expected to expand especially with support from AIM program and UNICEF Other partners include TASO, UWESO, Ntungamo District Health Services and AIC. They address pertinent issues related to stigma and discrimination, home based care for PLWAs and orphans, awareness creation and prevention activities.

Communities rely to a great extent on the private sector for treatment of common childhood illnesses. According to a 2001 MOH study, *private practitioners* (PPs) provide care for 75% of children. 28% of PPs are shopkeepers and drug sellers. Adome et al (1996) estimated that only 23% of pharmaceuticals are obtained from the public sector. The largest suppliers of drugs are shops, the *dukas*, where people buy staples, and public markets. Shopkeepers are untrained and often operate illegally. Traditional Healers (TH) provide traditional care but also perform dangerous practices such as tooth extraction. TBAs inform and counsel mothers in relation to childhood illness. In September 2002, in recognition of the role of PPs, the MOH IMCI Unit and the National Malaria Control Program developed the *National Strategy for Utilizing the Potential of Private Practitioners in Child Survival*. Africare's expanded work with PPs in Ntungamo follows this strategy.
Uganda has made a strategic policy to make the private sector a major partner in national development by encouraging and supporting private practitioners in providing healthcare in areas not effectively served by public facilities. The objectives of the strategy are: (1) Improve private practitioners practices related to case management and childhood malaria, diarrhea and ARI; (2) Improve private practitioners' skills in recognizing severely ill children and referring
them; (3) Support private practitioners in providing suitable child preventive services, and (4) Increase the proportion of private practitioners who are registered with government regulatory bodies.

According to the CIMCI-Plus KPC baseline survey, more than half of mothers consult with relatives and neighbors, regarding child sickness. Mothers consult neighbors (59%), mother in-law (37.3%), medical doctors (22%) and community health workers (26%). Major determinants for using a health facility include a worsening condition, fever and/or inability to drink or breastfeed. Decisions to seek care outside the home lie with the head of the household who is, in most cases, the husband.

Malaria is mostly treated based on the manifestation of fever. An estimated 85% of children with fever seek care, but 32% go to government health facilities/clinics with a trained provider. 37% obtain treatment from a drug shop or *duka*, often receiving incorrect dosages. The main reasons for using these shops include proximity to home, ability to negotiate price, dose and type of drug, ability to buy on credit, faster and friendlier service, and skepticism of the government system. Most women consult their neighbors who are not qualified health professionals. They include shopkeepers who give them incorrect doses. The Ministry of Health with support from SARA Project under the Public Private Partnership Program is targeting these groups to negotiate them out of these bad practices. The Project will complement this effort by encouraging communities to seek care from qualified health workers and to negotiate them out of the harmful practices that relates to children's health. Alternative means of survival for these groups will include encouraging them to sell the mosquito nets where they obtain profits. Since physical accessibility to health facilities is limited, many mothers and caretakers rely on

outreach vaccination but these are not consistently followed by health workers and contributes to high drop out.

Most children with diarrhea are treated with traditional herbs (74.5%), ORS (7.8%) and commercial anti-diarrheal treatments including antibiotics (25.5%). 41.2% cases are attributed to 'false teeth' (*Ebino*) and referred to a TH for tooth extraction. Health and hygiene practices are deficient due to lack of water and sanitation facilities. Irrational drug use poses a problem in treatment of acute respiratory infections (ARI). Project experience indicates common confusion among fever, malaria and ARI. As with diarrhea, some ARI episodes are diagnosed as *millet* disease and are referred to THs for *millet* extraction.

Summary Project Indicators by Intervention

Revised Project Objective	**Baseline**
Nutrition/breast-feeding/Micro nutrients	
1. Children aged 0-23 months who were breast-fed within the first 60 minutes of delivery	61%
2. Children 0-6 months who were exclusively breast-fed	48%
3. Mothers who indicate that children should be exclusively breast-fed for six months	81.9%
4. Children that continue being breast-fed until 12-23 months	30.1%
5. Children 6-59 months who are fed vitamin A rich foods	75.6%
Control of Diarrheal diseases	
1. Children < 60 months with diarrhea who were treated with ORT at home (ORS)	7.8%
2. Children < 60 months of age who had diarrhea and were given same of more fluids	81.9%
3. Households with designated hand washing facilities with soap/ash present that mentioned the importance of washing hands after defecation to prevent diarrhea	4%
4. Children 6-59 months with diarrhea who were given the same amount or more solid or mashed foods	67.2%
5. Mothers with children < 60 months who identify at least 2 signs of diarrhea requiring treatment	54.6%
6.Children <60 months who were taken for false tooth extraction	41.2%
Immunization coverage	
1.Children 12-23 months who received BCG before their first	65%

Revised Project Objective	Baseline
birth day	
2.Children 12-23 months who received OPV3 before their first birth day	62.4%
3. Children12-23 months who received DPT3 before their first birth day	61.4%
4. Children 6-23 months who received a measles vaccine	55.4%
5. Mothers with children 0-23 months who received at least two tetanus toxoid injections before the birth of their youngest child. **Control of Malaria**	20.4%
1. Children 6-59 months with fever given the same amount or more fluids	78.4%
2. Children 6-59 months with fever given the same or more solid/mashed foods	67.8%
3. Mothers with children <60 months who report giving chloroquine and Fansidar to febrile children at homes	6.3%
4. Mothers with children <60 months who identify at least two signs of malaria requiring immediate treatment	69.4%
5. Children <60 months who slept under an insecticide treated net (ITN) the previous night	14.4%
6. Children <60 months who were taken for millet extraction	12.2%
7. Mothers who took anti-malarial drugs during the last pregnancy to prevent malaria	49.8%
HIV/AIDS	
1.Mothers with children <60 months who cite at least two known ways of avoiding HIV/AIDS	67.8%
2.Mothers who cite that HIV/AIDS can be transmitted through pregnancy, delivery and breastfeeding	36.2%
3.Mothers with children < 60 months who had ever tested for HIV/AIDS	6%
4.Mothers with children<60 months who indicated that they can allow an HIV positive child to play with theirs	43.6%

2. Program Description by Objective, Intervention and Activities

Goal and Objectives of CIMCI-Plus

By the end of 2008, Africare and MOH will have contributed to a reduction of morbidity and mortality of children under-five and have improved the health status of Women of Reproductive age in the 15 sub-counties of the Ntungamo District of Uganda. In contribution to this goal, the project will have the following four general objectives:

1. To promote the knowledge and behavior related to the prevention of childhood illnesses, at the household and community levels;
2. To improve the home management of the sick child by promoting timely and appropriate care seeking at the household and community levels;
3. To improve the accessibility of under-five children and women of reproductive age to quality health services and products, both at the facility and community levels.
4. To strengthen national and district MOH capacity to replicate and sustain the community IMCI approach.

To achieve the above goals and objectives, CIMCI-Plus will build on the achievements and lessons learned from the first phase, and will provide an opportunity to consolidate CIMCI model, based on CORE/BASICS *Community H/H IMCI Framework*. The framework has three elements and builds on strong multi-sectoral platform. Under Element 1, linkages will be strengthened through outreach services; a facility-supported community health information system; participation of health facility staff in behavior change and communication (BCC) activities; and improvement of facility services provided to the mother and child. Under Element 2, community services will be expanded with focus on quality of services provided by shopkeepers and traditional birth attendants. Commodities including anti-malaria drugs, bed nets and condoms will be more accessible. Under Element 3, promotion of 16 key family practices for disease prevention, improved decision-making, home treatment and care seeking for childhood illnesses will be a central focus under this element. Innovative BCC approaches such as community drama, demonstrations, referral and home visiting will be used. The project will use a trainers' of trainers (TOT) strategy to train sub county trainers who will train the Community Resource Persons (CORPS) and Parish Development Committees (PDCs) while working with project staff. In the phase out period, the sub county trainers together with health workers will continue follow up activities during and after the project period.

Using matching funds, CIMCI-Plus will continue to expand *multi-sectoral platform* activities of water and sanitation, vegetable gardens and animal husbandry, income generation through working with different district sectors and other local CBOs, FBOs and NGOs.

CIMCI-Plus Project Result frame work

The confidence intervals (CI) have been computed for 95% confidence level. Since the sample sizes were greater than 30, the Z values were used as Z0.025 = 1.96.

Indicators	Benchmarks	Measurement methods	Major Planned Activities
Objective 1. To promote knowledge and behaviors related to the prevention of childhood illnesses at household and community levels			
Malaria			
The number and percentage of children aged 0-59 months who slept under an insecticide treated nets	14.4% to 20% (CI 11.2%-17.6%, n=451)	Baseline, midterm, final KPC, LQAS and CHIS	BCC activities, training of PDCs and CORPs, bed net club schemes, linking communities to suppliers like PSI, Quality Chemicals, and establishment of ITN outlets at sub-county level. .
The percentage of pregnant mothers who took anti-malarial medicine to prevent malaria during pregnancy	49% to 60%. (CI 44.1%-55.3%, n=304)	Baseline, midterm and final KPC, LQAS	BCC activities, training of PDCs and CORPs, availability of anti-malaria drugs at the facilities and strengthening child and antenatal services.
Immunization			
The percentage of children 12-23 months that received BCG before their first birthday	65% to 70% (CI 58.8%-71.8%, n=206)	Baseline, midterm and final KPC	BCC activities, training of PDCs, CORPs immunization mobilizers, supervision of facility vaccination services and support to community immunization outreach sessions.
The percentage of children12-23 months that received DPT3 vaccine before the first birthday	61.4% to 66%. (CI 55.8%-69%, n=206)	Baseline, midterm and final KPC, HMIS, CHIS and LQAS	BCC activities, training of PDCs, CORPs immunization mobilizers, supervision of facility vaccination services and support to community immunization outreach sessions.
Percentage of children12-23 months that received OPV3 before their first birthday	62.4% to 68% (CI 54.8 %-68.0%, n=206)	Baseline, midterm and final KPC, HMIS, CHIS and LQAS	BCC activities, training of PDCs, CORPs immunization mobilizers, supervision of facility vaccination services and support to community immunization outreach sessions.
Percentage of children12-23 months that received measles vaccine before their first birthday	55.4% to 60% (CI 48.6%-62.2%, n=206)	Baseline, midterm and final KPC, HMIS, CHIS and LQAS	. BCC activities, training of PDCs, CORPs immunization mobilizers, supervision of facility vaccination services and support to community immunization outreach sessions.
Percentage of mothers who received at least two tetanus toxoid injections before the birth of the youngest child less than 24 months	20.4% to 26% (CI 14.8%-26.0%, n=199)	Baseline, midterm and final KPC, HMIS and LQAS	BCC activities, training of PDCs, CORPs immunization mobilizers, supervision of facility vaccination services and support to community immunization outreach sessions.
HIV/AIDS			
The percentage of women of reproductive age who cite that HIV/AIDS can be transmitted through pregnancy, delivery and breastfeeding	36.2% to 45%. (CI 31.0%-41.8%, n=304)	Baseline, midterm and final HIV/AIDS survey	BCC activities on PMTCT , training community counseling aides and linking mothers to VCT/PMTCT centers.
The percentage of mothers with children <60 months who cite at least two known ways of avoiding HIV/AIDS	67.8% to 80% (CI 62.5%-73.1%, n=304)	Baseline, midterm and final HIV/AIDS survey	BCC activities, working with women groups and post test clubs to disseminate key messages, refresher training of counseling aides
The percentage of mothers with	43.6% to 48% (CI	Baseline, midterm and	BCC, working with post test clubs, drama clubs refresher training of CCAs and

Indicators	Benchmarks	Measurement methods	Major Planned Activities
children <60 months who indicate that they can allow an HIV positive child to play with theirs	38.0% 49.2% n =304)	final HIV/AIDS survey	encouraging home visiting
Nutrition, Breastfeeding and Micronutrients			
The percentage of children 0-5 months who were exclusively breastfed	77% to 88% (CI 66.4 %-87.6%, n=61)	Baseline, midterm and final KPC	BCC activities, training of PDCs and CORPS and application of positive deviant approach and formation of mothers support groups.
The percentage of children 0-23 months who were breastfed within the first 60 minutes of delivery	64%-72% (CI 57.4%-70.6%, n=206)	Baseline, midterm and final KPC	Educate and sensitize communities on the importance of colostrums in protecting children from diseases through BCC strategies and formation of mothers support groups
The percentage of mothers who indicated that children should be exclusively breastfed for six months	81.9 to 85% (CI 77.6%-86.2%, n=304)	Baseline, midterm and final KPC	Educate and sensitize communities on the importance of colostrums in protecting children from diseases through BCC strategies and formation of mothers support groups
The percentage of children12-23 months that continue being breastfed	30.1% to 35% (CI 26.7%-35.3%, n=451)	Baseline, midterm and final KPC	BCC activities, training of TBAs formation of mothers support groups and interpersonal communication
The percentage of children 6-59 months that were fed on Vitamin A rich foods the day before	75.6% to 80% (CI 71.3%-79.9%, n=389)	Baseline, midterm and final KPC	BCC activities, training of PDCs and CORPs and vegetable growing and cooking demonstrations.
Control of Diarrheal Diseases			
The percentage of households with designated hand washing facilities with soap/ash present that mentioned the importance of washing hands after defecation to prevent diarrhea	4% to10% (CI 1.8% 6.2% n =304)	Baseline, midterm and final KPC	BCC activities, training of PDCs, CORPs water user committee members on water and sanitation and establishing locally improved hand-washing facilities. For demonstration purposes. .
Objective 2. To improve home management of the sick child by promoting timely and appropriate care seeking at the household and community levels			
Malaria			
The percentage of children 6-59 months with fever that were given same or more fluids	78.4% to 85% (CI 68.5%-88.3%, n=67)	Baseline, midterm and final KPC	Educate and sensitize communities about the importance of maintaining/increasing fluids to a child with fever through interpersonal communication, home visiting,
The percentage of mothers with children <60 months who reported giving chloroquine and fansidar to febrile children at home	6.3% to 16% (CI 0.0%-12.6%, n=58)	Baseline, midterm and final KPC	BCC activities, training of chloroquine distributors and shopkeepers about the new MOH anti-malaria drug policy
The percentage of children 6-59 months that were given same or more solid/mashed foods	67.8% to 70% (CI 56.6%-79.0%, n=67)	Baseline, midterm and final KPC	Educate and sensitize communities about the importance of maintaining/increasing foods to a child with fever through drama, health education and home visiting.
Percentage of children 0-59 months who were taken for millet extraction	12.2% to 8% (CI 9.2%-15.5%, n=451)	Baseline, midterm and final KPC	Mobilize and educate communities for prompt care seeking from qualified health personnel
Control of Diarrheal Diseases			
The percentage of diarrhea sick	67.2%-70% (CI 56.0%	Baseline, midterm and	BCC activities, nutrition education, training for PDCs and CORPs.

Indicators	Benchmarks	Measurement methods	Major Planned Activities
children 6-59 months that were given same or more solid/mashed foods	78.4% n =67)	final KPC	
The percentage of diarrhea sick children <60 months that were given same or more fluids	81.9% to 85% (CI 73.5% 90.3% n =81)	Baseline, midterm and final KPC	Educate and sensitize communities about the importance of maintaining/increasing fluids to a child with diarrhea.
The percentage of children <60 months with diarrhea who were treated with ORS	7.8% to 14% (CI 2.0% 13.6% n =81)	Baseline, midterm and final KPC	Educate and sensitize communities about the importance of ORS and other fluids to a child with diarrhea
The percentage of mothers with children<60 months who can identify two signs of diarrhea requiring treatment	54.6% to 60% (CI 49.0% 60.2% n =304)	Baseline, midterm and final KPC	BCC messages on recognition of signs and symptoms
The percentage of children 0-59 months who were taken for false teeth extraction	41.2%-35% (CI 36.7% 45.7% n =451)	Baseline, midterm and final KPC and focus group discussion	BCC activities, negotiation with traditional healers
Objective 3. To improve accessibility of under five children and women of reproductive age to quality health services and products at both the facility and community levels			
HIV/AIDS			
The percentage of mothers with children <60 months who go for HIV testing	6% to 10% (CI 3.3% 8.7% n =304)	Baseline, midterm and final HIV/AIDS survey	BCC activities, facilitation of post test clubs to disseminate HIV/AIDS messages
Number of condoms distributed	Increase number of condoms distributed in the project area from the current 12,960 to 50,000	Supervision and Field officers reports	BCC activities, facilitation of post test clubs to disseminate HIV/AIDS messages
Number of mothers who receive PMTCT services	Increase the percentage of mothers in the project area receiving PMTCT services from the current 30 to 210	Supervision and Field officers reports	BCC activities, facilitation of post test clubs to disseminate HIV/AIDS messages
Objective 4. To strengthen National (MOH) and district capacity to replicate and sustain CIMCI			
The number of the specified structures trained and active.	Capacity building for: 40 Sub-county trainers; 900 CORPS, 100 PDCs; 7 CBOs; 84 immunization mobilizers; 150 TBAs, 100 water user committee members; 48 CCAs, 21 women/drama groups; and 60 health workers.	Supervision and Field officers reports	Training and refresher courses.
Number of bi-annual newsletters, quarterly reports and annual reports produced.	Documentation of project lessons and experiences through bi-	Field officers reports, KPC surveys, HMIS, Operation and formative	Compiling reports/newsletters and other documentation on a timely basis and disseminating them.

Indicators	Benchmarks	Measurement methods	Major Planned Activities
	annual newsletters (10) quarterly reports (20) and annual reports (5)	research findings.	

3. Intervention Specific Approach: BCC, Access and Quality

The CIMCI-Plus project will adapt the BEHAVE framework as an overall and crosscutting strategy that will be applied for all interventions. This strategy will be used in understanding and addressing the enabling and limiting factors for behavior change of all project interventions.

The Ministry of Health and partners have developed a household and community IMCI communication strategy as a basic guide or tool for behavior change. The strategy spells out the sixteen household and community practices grouped in four main categories: (i) Growth promotion and development; (ii) Disease prevention; (iii) Home management of a sick child; and (iv) Care-seeking and compliance. The strategy will be implemented by (i) mobilizing partners and resources at all levels; (ii) improving the quality of interpersonal communication at health facilities; (iii) intensifying dissemination of messages and support positive action at community and household levels; (iv) strengthening the linkages between communities and health facilities; and (v) developing appropriate supervision, monitoring and evaluation tools.

Malaria (35% effort)

According to the CIMCI-Plus baseline survey, malaria is still a problem in target communities. 29.3% of the children studied were reported to have had fever in the two weeks preceding the survey. CIMCI-Plus identified the following community practices and beliefs as barriers to behavior change: associating convulsions locally known as ***ebihungu'***, with ancestral spirits and thus requiring traditional means of treatment, seeking care for children with malaria and difficult breathing from traditional healers to treat the *millet disease*. It is believed that malaria is caused by eating mangoes, drinking un-boiled water, rain and drinking concentrated milk. The treatment involves an incision being made on the child's chest using sharp metallic and often un-sterilized instruments to extract the *"millet"*.

To address the above barriers, the malaria BCC strategy will focus on malaria control and prevention activities that include: Improved malaria disease recognition, promotion of early care seeking for childhood malaria, use of insecticide-treated mosquito nets, including regular re-treatment of nets, and promotion of intermittent presumptive treatment (IPT) for pregnant women. Key BCC messages will focus on: how malaria is transmitted, importance of children and pregnant women sleeping under insecticide treated nets, and how nets can be used whether people sleep on a floor or a bed, recognition of signs and symptoms of malaria, home management of fever (giving a child the same or more fluid/foods during sickness), reliable sources for anti-malaria drugs, drug compliance, where to seek medical care and advice in the first 24 hours of the on set of malaria. Messages will be delivered through appropriate channels that include drama and film shows, health education sessions, distribution of IEC materials and home visiting.

To ensure the quality of messages CIMCI-Plus will follow the MOH communication strategy for child survival, growth and development. The project will use experienced BCC staff; CORPs and implementing partners (supervised by the project BCC specialist and health sub-district medical officers) to sensitize and educate caretakers to further enhance the quality of messages. A positive deviant approach to behavior change will be applied to influence caretakers' household practices and discourage harmful practices. The positive deviant approach will be employed using mothers who have successfully managed to prevent malaria using ITNs to influence other mothers to take up the practice. CIMCI "Model homes" will be identified and communities will be encouraged to learn from their positive practices. In addition, exchange visits to learn from the experiences of CIMCI phase I sub-counties will be encouraged during CIMCI-Plus implementation.

Major activities will include training of health workers (60), PDCS (100) and community own resource persons (900), community awareness and sensitization, formation of social support groups (bed net clubs), increasing accessibility of ITNs at sub-county level, advocacy for sufficient drugs at the health facility level, support dipping and re-dipping of mosquito nets and active participation in national malaria days. CIMCI-Plus will sensitize caretakers, women of reproductive age and men for behavior change. School children will also be targeted with messages to disseminate at school and communities through school choirs. Field officers will support the process of forming the mosquito nets clubs in the communities to increase their purchasing power by pooling resources as was in phase I. At least three (3) bed-net groups will be formed in each of the target sub-counties. The project will also support the district efforts to treat and retreat mosquito nets at the community level through community mobilization and health education during the exercise. As part of advocacy activities, the project will actively participate in national malaria days where key malaria experiences will be shared with others. Project staff will be encouraged to participate by erecting malaria stalls. Staff will also learn from other partners to bring new ideas that reinforce our practices. To sustain behavior change outcomes such as mosquito net use and early care seeking, the project will ensure that awareness activities are integrated in the sub-county development plans.

To increase access to ITNs, the project has already and will continue to dialogue with private sector distributors such as PSI and Quality Chemicals Limited to establish at least one outlet in each of the target sub-counties at ordinary shops and/or registered private clinics. CIMCI-Plus will not directly be involved in the procurement and sale/distribution of ITNs. The purchase and supply of ITNs at the sub-county level will be sustained through encouraging household income generating activities by linking beneficiaries to existing micro-credit institutions. The project will negotiate with private suppliers to supply ITNs at subsidized rates. Since the suppliers will earn profits, they will be motivated to continue the supply. The MOH has embarked on scaling up the national voucher system to maximize access of ITNS at subsidized prices particularly for children and pregnant women. The system was tested and proved a potential strategy to maximize ITN access in the country. In addition, the government is in the process of obtaining global funds to supply approximately four million free ITNs to the most vulnerable groups. This will further increase ITNs accessibility.

The MOH recently introduced a home-based management of fever strategy in under-fives using a pre-packaged combination of chloroquine and fansidar (homapak) as the first line of treatment. The new policy is currently in 30 districts excluding Ntungamo. However, with support of The Global Fund, the MOH is in the process of scaling up to the remaining 26 districts including Ntungamo to have the complete national coverage. Under the policy, MOH and Africare will provide BCC messages, training of community based drug distributors in support of this policy. CIMCI-Plus will thus follow the WHO "Roll Back Malaria" (RBM) strategy. The strategy includes: (i) case management; (ii) IPT for pregnant women; (iii) vector control; and (v) epidemic prevention, preparedness and response. The project will contribute to this strategy through the malaria BCC approach as explained above. To enhance access and sustain anti-malaria drugs supplies, the project will continue to advocate for their consistent availability at health facilities and in the community through DHT meetings and meetings with key decision makers.

The CIMCI-Plus M&E system will improve on health facility data management, report compilation and utilization to enable the district use data to influence district drug procurement and allocation procedures without unnecessary delays that are frequently caused by either delayed submission of reports, requisitions and/or poor drugs projections from health facilities. Using operations research, the project will conduct an in-depth study about the millet disease and use information to design appropriate messages to eliminate the practice.

Immunization (25% effort)

This intervention was added in response to the compelling need for improved immunization coverage due to a marked decline in the numbers of children being fully immunized. Based on the recent CIMCI-Plus survey, only 38% of children 12-23 months are fully vaccinated, with less than 29% fully vaccinated before their first birthdays. This is attributed to the high drop out rates (25% for DPT and 28% for polio). The drop out rate results from failure of health workers to follow routine immunization outreach schedule, short and inadequate immunization sessions that are not integrated with antenatal care at health facilities, mothers beliefs that vaccines may contain the HIV virus, and a belief that children fall sick and die after national immunization days.

To address the above practices and beliefs, the BCC immunization strategy will focus on: education and sensitization of communities to fully immunize their children before the first birthday and pregnant women to receive at least two tetanus toxoid injections. CIMCI-Plus will disseminate the following key messages to overcome the barriers, (1) immunization is safe, free of charge and protects the children from the eight diseases that can kill or disable children, (2) importance of caretakers following the immunization schedule, (3) all women to complete five doses of tetanus toxoid injections and (4) give vitamin A to a child to develop strong immunity against diseases. Health workers and field officers will disseminate the messages during static immunization and immunization outreaches. Others message disseminators will include community resource persons, immunization mobilizers, sub-county extension staff, school children, village leaders and private providers. The project BCC specialist, District cold chain officer, monitoring and evaluation officer and health unit will supervise message dissemination to ensure that correct messages are delivered and to suitably respond to any emerging issues that may hamper behavior change. The project will work with MOs to optimize schedules of immunization sessions at health facilities, taking into consideration current patient flows and mothers' perceptions. In-charges will ensure that immunization sessions are carried out at announced days and times, and that vaccinators are available during these schedules. CIMCI-Plus will focus on message dissemination since this is an area that was identified as a gap by the DHT.

Major activities under immunization intervention will include: training; support and strengthening of immunization outreach; community mobilization and sensitization; strengthening women groups, faith based organizations (FBOs), CBOS and NGOs especially URCS to actively promote immunization; household competitions; monitoring and supervision; distribution of IEC materials and active participation in national immunization days through mobilization and sensitization of mothers and caretakers to take children at the immunization posts during the exercise. CIMCI-Plus project will train health workers (60), drama clubs (21) and parish mobilizers (84), and COPRS (900) in communication skills, immunization safety, organization of static and outreach activities, or other skills that may affect community members' decisions to use immunization services. These structures and groups are linked together by the NGOs/CBOs forum in the district and the community development department, which bring them together both at the Sub-county and district levels. The project will work with groups that are recognized by the Sub-county and the district. The project will support immunization outreach through joint planning, mobilization and sensitization of communities to utilize available services. Other mobilization strategies will include home visits, education sessions, and drama/film shows. As part of the sustainability strategy of positive immunization household behaviors, the project will involve CBOs, women groups and FBOs in planned immunization to maximize coverage and sustain mobilization activities beyond the project life.

The project will also support 'child days". This will be done twice yearly activity (May and November) by MOH to revitalize immunization. Other activities that take place on child days include de-worming and vitamin A supplementation. The project will support the activity by mobilizing communities to bring children to designated posts and health facilities. Household competitions will be held once in the middle of the project and relevant prizes like ITNs, hand washing facilities will be given to motivate best performing households in practicing 16 key behaviors including vaccinations to encourage others to emulate positive behaviors. IEC materials on immunization translated in the local language will be distributed. To enhance quality of immunization activities, the project M&E Specialist, health in-charges and the cold chain officer will routinely monitor and supervise activities using EPI checklists. CIMCI-Plus will use the IMCI facility surveys and LQAS to collect information to use to evaluate and monitor the immunization performance in the program area. The data will be used to track immunization coverage over time. Formative research will also be conducted to find out why the health workers are not consistently following routine immunization outreach schedules.

The project will also support and actively participate in national immunization days. Community mobilization and awareness creation prior and during the exercise will be Africare's central role. The MOH through EPI has a well-established cold chain network that ensures steady supply of vaccines all the time. Static immunizations are carried out at all the health facilities in the District once a week and each health facility carries out weekly outreach activities on a weekly basis. There is no problem associated with access of vaccines envisaged in target communities.

HIV/AIDS (15% effort)

HIV/AIDS is an additional intervention under CIMCI-Plus with 15% level of effort. The level of effort has been influenced by other partners such as TASO, AIM, AIC and UWESO who are implementing related activities in the district and other Africare match funded HIV/AIDS activities. According to the recent household KPC survey, there is stigma and discrimination of PLWAS. Only 43% of mothers indicated said that they could allow an HIV positive child to play with theirs. Information from focus group discussions revealed that an HIV positive test induces individuals to die faster, mismanage resources and/or intentionally infect others so as not to die alone. There is limited use of VCT services; only 6% of the women interviewed had gone for HIV testing. There is little knowledge about mother-to-child transmission (MTCT). Only 36.2% of mothers cited that HIV/AIDS can be transmitted through pregnancy, delivery and breastfeeding. Anecdotes indicate that there is limited and inconsistent use of condoms including marital unfaithfulness.

CIMCI-Plus will work closely with health workers to create awareness about PMTCT and voluntary counseling and testing (VCT) services and will link communities to the health facilities for service utilization. Messages aimed at reducing stigma and discrimination will also be emphasized. Key messages on PMTCT will include not breastfeeding at all for newborn children by HIV positive mothers, exclusive breastfeeding for the first three months or six months and stop to introduce complementary feeding, encouraging pregnant women to seek VCT services to ensure access to nevirapine in the case of sero-positivity to prevent their children from acquiring the virus. In addition, the project will emphasize that knowing one's HIV/AIDS status helps one plan better one's life through counseling if positive and/or avoid any possible source of transmission if negative.

The project will promote all the three messages during awareness creation campaigns and will refer mothers to the trained health workers for further counseling to make informed decision on the appropriate infant feeding choices. In the communities, the main replacement feeding option, which is also relatively affordable, is cow's milk. The modified formula feeds are not easily accessible and are very expensive for rural mothers. Other messages include treating HIV/AIDS

like any other disease and caring for the sick including orphans. CIMCI-Plus will adapt the Uganda Abstain, Be faithful and use Condoms (ABC) model as the BCC strategy. Project messages on ABC will place emphasis on the prime importance of consistent and correct use of condoms, and fidelity in a relationship.

Key project activities under the HIV/AIDS intervention will include: (1) community mobilization and sensitization, (2) training of community counseling aides, (3) condom distribution, (4) support and participation in World AIDS Days, and (5) support VCT mobile outreach. CIMCI-Plus project will place emphasis on community mobilization and sensitization activities that include: peer health education talks in school and regular community meetings, drama/film shows, IEC materials distribution, and home visiting. Using the BEHAVE framework, audiences will be segmented according to the group of behaviors targeted for change thus avoiding message overload for any given audience. In the same way, specific channels will be selected taking into consideration the effectiveness of each channel in reaching specific audiences. The project will refresh community-counseling aides (48) in basic counseling skills, train CORPS (900), post test clubs (7), PDCs (100) and TBAs (150) in mobilization and communication skills for VCT and PMTCT services. The project will support and participate in major HIV/AIDS events including World AIDS Day. On such events, testimonies from community members who have changed their behavior will be encouraged. Key government officials will be involved to witness and advocate for services such as VCT and MTCT.

The project will use training manuals developed by TASO and MOH. The project will partner with the NDHS; AIDS Integrated Model District Program (AIM); The AIDS Support Organization (TASO); AIDS Information Center (AIC); and Uganda Women's Efforts to Save Orphans (UWESO) to ensure the quality of BCC messages and training. Other partners will include FBOs and CBOs to scale up and help sustain message dissemination activities. Monitoring and supervision will be done by the health workers, CIMCI project staff and AIC at health facility levels. AIC produces monthly reports on VCT services that help to monitor progress in VCT and PMTCT service utilization. The partnerships and monitoring activities will help sustain positive behavior changes such as increased care seeking for VCT, PMTCT services and condom use. Access to supplies such as condoms and sexually transmitted infections (STI) drugs are provided by the MOH and will be sustained. The MOH and AIC are providing HIV testing kits. The District has 9 laboratory technicians who also carry out HIV testing, 111 and 20 health workers are trained in PMTCT and VCT respectively. MOH is supporting provision of Nevirapine to pregnant women and newborn children at the four mini-hospitals of Kitwe, Rwashamaire and Rubare and Itojo, district referral hospital. Antiretro-viral Therapy (ART) is only available at the regional hospitals. Ntungamo's clients are referred to Mbarara regional hospital. CIMCI-Plus will continue to be complemented by Africare Title II feeding program that provides food supplementation to people living with HIV/AIDS (PLHA) and orphans.

HIV/AIDS behavior changes such as continued testing and safer sex practices will be sustained through FBOs and CORPS during mobilization and sensitization activities at the community level. HIV/AIDS being a multi-sectoral problem, every sector or department in the district has a program on HIV/AIDS to leverage synergies to sustain behavior change. Any opportunity where people are gathered will be utilized to address issues of HIV/AIDS through constant reminders and advocacy particularly by local area leaders.

Nutrition, Micronutrients and Breastfeeding (15% effort)

The recent household survey indicated that nutrition; micronutrients and breastfeeding practices are undesirable. Only 48% of children 0-6 months were exclusively breastfed at the time of the survey; 24% continued breastfeeding the children for at least 24 months. Focus group

discussions revealed that mothers often give water to newborn babies before initiating breastfeeding. The reason is that mothers take some time to produce breast milk after delivery. Mothers sometimes start giving children additional foods before the age of six months responding to the child's apparent desire to eat. Mothers believe that even if they are breastfed many times in a day, they do not get satisfied. The BCC CIMCI-Plus approach to address barriers under this intervention will focus on the following messages: 1) exclusive breastfeeding of infants up to six months; (2) appropriate complementary feeding after the sixth months of age, and continued breastfeeding until 24 months including emphasis on the value of continuing feeding during illness;(3) appropriate nutritional management of all sick and malnourished children according to IMCI guidelines; (4) Adequate intake of vitamin A-rich foods and/or vitamin A supplements by women, infants and children; and (6) Adequate intake of iron in combination of other micronutrients and other interventions to prevent anemia.

Pivotal activities to enhance the messages and overcome aforementioned barriers will include: (1) Orientation of TBAS (150), CORPS (900) and PDCS (100), (2) community mobilization and sensitization, (3) establishing backyard and front yard gardens (4) rabbit raising and establishment of fish ponds. Orientation of aforementioned structures will be organized and conducted in partnership with district nutrition, veterinary and agricultural officers and community development assistants to provide technical quality assistance and NGOs particularly ADRA and the Kyera Farm project to provide demonstration sessions. Orientation will focus on capacity building skills in raising vegetable nursery beds, rabbit raising and aquaculture, balanced diet and skills in mobilizing and sensitizing others. The project BCC specialist, district agriculture, veterinary and agriculture officers will supervise training activities.

The project will conduct nutrition education sessions through drama, cooking demonstrations and IEC materials distributions. Discussions with mothers revealed that the major barriers to exclusive breastfeeding are inadequate breast milk and early pregnancies. BCC messages will place emphasis on mothers' breastfeeding more often to stimulate milk production and proper feeding for pregnant and lactating mothers. At least 3 cooking demonstrations will be conducted per sub-county over the life of the project to help mothers/caretakers learn how to prepare a balanced diet using locally available foods. In order to address barriers to breastfeeding, the project will apply the positive deviant approach where mothers' support groups will help in demystifying myths and false practices regarding breastfeeding. CIMCI-Plus will promote increased household availability and diversity of food as well as household food security. Using matching funds, CIMCI-Plus will continue supporting the growing of spinach, carrots, eggplant and cabbage. Local rabbit breeds, fish such as melarcup and tilapia will be raised to enhance intake of protein rich foods. In addition, interpersonal communication and positive deviant approach will be applied where mothers doing well will share their good practices to influence behavior change.

As in CIMCI phase I, the project will seek community contributions for these ventures, such as land for gardens, locally available construction materials and fishponds to enable communities own and sustain ensuing benefits. In addition, the project will encourage beneficiaries to generate incomes from surplus produce that will sustain positive behavior change outcomes such as consumption of vitamin A and protein rich food. This in the same way will maintain access to the much-needed foods for child survival.

Childhood Diarrhea Diseases (10% effort)

Focus group discussions revealed that mothers perceived causes of diarrhea to be: breast-feeding a child when the mother is pregnant, *false teeth (ebiino)* and the development of the normal teeth. Diarrhea was also associated with inhaling wind and worms. It emerged from the discussions that mothers commonly give local herbs (chewed and orally administered) to

children with diarrhea. The KPC indicated that 36.6% sought care outside the home; 7.8% used ORS; and just 4% of the households had hand-washing facilities. The CIMCI-Plus BCC key approach to diarrhea to overcome the barriers is promoting improved hygiene and sanitation and home-based management using ORS and other locally available fluids. Key BCC messages will include; exclusive breastfeeding for the first six months with emphasis on mothers providing colostrum, proper disposal of feces including children's feces in the latrine; washing hands with water and soap/ash after using the latrine before preparing food, feeding the baby and before eating; giving more or the same amount of fluids/food during diarrhea episode; recognition of signs and symptoms of malaria that require immediate treatment and emphasizing that false teeth (which are believed to be maggot-like substances in the child's gum only treated by extraction) in children does not exist and caretakers should desist from taking their children for extraction.

The project will carry out the following activities: (1) Construction of small water supply systems (for example, protected public wells) (2) community mobilization and sensitization (3) training of water user committees (100), PDC (100), TBAs (150) and CORPS (900) and (4) formative/operations research on factors that influence health care patterns for harmful practice of false teeth extraction. This will be done through conducting key informant interviews and focus group discussions on the attitudes, beliefs and practices. Results from OR will be used to design appropriate messages and in the development of concrete strategies for addressing the harmful practices. With matching funds, Africare will work with communities to build and protect water sources such as shallow wells, springs and water tanks at community and health facility levels. The project will train local masons to support the project water specialist in construction and protection of water sources. At least 100 water-use committee members will be trained to protect and sustain water sources. They will be trained in water source maintenance and resource mobilization. Other structures that include TBAS, CORPS and PDCs will be oriented and given skills as change agents in correct mixing of ORS, making simple and affordable hand-washing facilities, community mobilization and communication skills to disseminate key BCC messages. ORS will continue to be provided through the government health facilities and through private providers where possible. Trained structures will also be used to distribute ORS at the community level to ensure its continued access. Health assistants and in-changes, including field project staff, will organize and conduct training activities. The district and county health inspectors including the project BCC specialist will do monitoring and supervision to maximize the quality of training including constant regular distribution of ORS. Training manuals will be obtained from UNICEF, Directorate of Water Development (DWD) and the MOH.

Community mobilization and sensitization activities will focus on promoting sanitation and hygiene at the household level with hand washing facilities, encouraging caretakers to use ORS and readily available fluids mainly from cereals such as porridge and to seek immediate care when the child is sick. Awareness creation channels will include drama shows/films, household visits and distribution of IEC materials on diarrhea. Positive behavior change outcomes such as washing hands after latrine use with soap/ash, correct use of ORS and locally available fluids will be sustained through constant reminders by CORPS and PDCs at household and community levels through mobilization and sensitization activities.

PARTNERS' INVOLVEMENT IN THE CIMCI PLUS PROGRAM

PARTNER	AREA OF PARTNERSHIP/ COLLABORATION	ROLES IN THE PARTNERSHIP
Ntungamo District Local Government	Malaria, Immunization Nutrition, HIV/AIDS, Diarrhea	Technical support and advocacy to project activities, integration of project activities in their development plans, co-implementers, monitoring and supervision, provision of health services in project areas, and mobilization of local resources to sustain the program
Ministry of Health	Malaria, Immunization Nutrition, HIV/AIDS, Diarrhea	Policy framework and advocacy, provision of technical reference materials and guidelines, support scaling up the best practices, health workers skills strengthening, equipping health facilities and ensuring steady supplies of essential drugs, health facility assessments, financial support to child days and re-dipping of ITNs
WHO	Malaria, Immunization Nutrition, HIV/AIDS, Diarrhea	Provision of technical reference materials, health facility assessments, information sharing and dissemination
UNICEF	Malaria, Immunization Nutrition, HIV/AIDS, Diarrhea	Provision of technical reference materials, co-implementers of CIMCI in the District, information sharing and dissemination, and provide technical support to address PMTCT
Uganda Red Cross Society	Malaria, Immunization Nutrition, HIV/AIDS, Diarrhea	Provide access to subsidized ITNs to communities, awareness and prevention activities, training of community resource persons, and sharing IEC materials
AIM	HIV/AIDS	Increasing access to VCT services in the District, provision of financial and technical support to CBOs and FBOs to carry out awareness and prevention activities, information sharing and dissemination and provide technical support to address PMTCT
AIC	HIV/AIDS	Information sharing and dissemination, provision of voluntary counseling and testing services, and financial and technical support to Post-Test Clubs to disseminate HIV/AIDS awareness and prevention messages
TASO	HIV/AIDS	Training of HIV/AIDS Community-based counseling aides, and provision of HIV/AIDS related IEC materials
Straight Talk Foundation	HIV/AIDS	Provision of IEC materials and conducting a weekly HIV/AIDS straight talk" program on local FM radio stations

PARTNER	AREA OF PARTNERSHIP/ COLLABORATION	ROLES IN THE PARTNERSHIP
Compassionate International	HIV/AIDS	Financial and psycho-social support to HIV/AIDS orphans and other vulnerable children including health and education
PSI	HIV/AIDS Malaria	Provide access of subsidized ITNs to mobilized communities in target sub-counties and social marketing of condoms
Quality Chemicals LTD	Malaria	Provide access of subsidized ITNs to mobilized communities in target sub-counties
UWESO	HIV/AIDS	HIV/AIDS awareness and prevention activities
ADRA	Nutrition	Technical support in vegetable gardens, rabbit raising and cooking demonstrations
Kyera Farm Project	Nutrition	Technical support in vegetable gardens, rabbit raising and cooking demonstrations
Africare UFSI	Nutrition	Technical support in vegetable gardens, rabbit raising and cooking demonstrations
MACIS	Malaria, immunization Nutrition, HIV/AIDS, Diarrhea	Provides a national fora for information sharing between the MOH, partners NGOs/PVOs and the private sector in the country particularly on best practices for scaling up
Communication for Development Foundation Uganda (CDFU)	Malaria	Share IEC materials
Sub-county-based CBOs	Malaria, Immunization Nutrition, HIV/AIDS Diarrhea	Community awareness and sensitization activities and spearhead sustainability efforts at community level by integrating project activities in their work plans
Makerere University	Malaria, Immunization Nutrition, HIV/AIDS, Diarrhea	Provide local consultancy services in data collection and analysis during baseline, midterm and final evaluation surveys
DWD	Diarrhea	Policy framework on water and sanitation and technical related reference materials on water and sanitation
FBOs	Malaria, Immunization Nutrition, HIV/AIDS Diarrhea	Community awareness and sensitization activities
CORE	Malaria, Immunization Nutrition, HIV/AIDS Diarrhea	Provision of technical reference materials, and technical support in documentation and sharing of project experiences at international and national levels
Malaria Consortium	Malaria	Provision of technical materials related to malaria prevention and treatment

Project Sustainability Plan

The CIMCI Plus Project recognizes that sustainability is an important component of the program that requires careful attention over the life of the program. In the context of CIMCI Plus, sustainability is defined as a planned, dynamic and creative process that (a) facilitates the evolution and continuation of program interventions; (b) maintains or expands health benefits achieved through the program and (c) builds on the capacity of local communities and local organizations to carry on the work after the project has phased out. In addition, there are a number of existing synergies which will help sustain both program and health outcomes. These include strong support from the Ministry of Health and the National Government for the G-IMCI strategies; strong partnerships with local and national NGOs whose programming are complementary to the G-IMCI project and whose capacity to continue on these programs will be built over the next four years through CIMCI; and, finally, the ability of CIMCI to be brought to scale, which is currently an undertaking of the national MOH and its decentralized structures.

Africare's approach to sustainability is based on over 30 years of experience working with communities in Africa. Key strategies to sustain CIMCI Plus are: (1) Partnership building; (2) Capacity building; and (3) Scaling up best practices.

Partnership building: The project's partnership strategy is multi-disciplinary, creating new synergies between the public health sector, private sector, NGOs, academia, research and rural communities. The program will continue building linkages by harnessing technical expertise of local academic and research institutions, government agencies and NGOs in order to bring solutions at community level in synergistic and convergent manner. As in phase I, the project will continue partnerships to create shared commitment and understanding in program implementation. This will be achieved through regular and experience-based dialogue, mutual respect and constant consultation.

The District is the major implementing partner and is committed to sustaining CIMCI as portrayed by the words of the District Chairperson "**during phase I, Africare helped us to perceive our child health problems and to find solutions to them. During phase 2, it is our role to work with Africare to further build our capacities, expand and sustain these solutions".** At the signing of the MOU, the District affirmed her commitment. CIMCI Plus activities will be integrated into the District and sub-county development plans.

Capacity building: As in phase I, capacity building will continue to be a major sustainability strategy. CIMCI-Plus will work with and train 900 CORPs, 100 PDCs, 49 community counseling aides, 21 drama/women groups, 150 TBAs, 84 immunization mobilizers, 60 health workers, 40 sub-county trainers and 100 water user committee members. They will be trained to facilitate and sustain the implementation of CIMCI project planned activities at the community level during and after the project period. They will also work to strengthen sustainable linkages between communities and health facilities.

Scaling up: The Ministry of Health embraced Africare's CIMCI phase I project as a model for implementing IMCI component three in the country. The project will continue documenting and sharing tools and other experiences that increase project's impact and visibility beyond the geographical limits of the project locations. The primary approach that will be used is that of making the project's experiences known to the wider audience by participating in workshops, conferences and distributing tools developed by the project. Working with Africare's Office of Health and HIV/AIDS, CIMCI Plus will continue a process of rigorous program documentation with a focus on national government and MOH support for the program. Project staff has

already begun this process with the documentation of Africare/Uganda's experience using the multi-sectoral platform to achieve sustained child health outcomes. These efforts will continue as Africare explores other opportunities with the Ministry of Health and its decentralized structures. As this is a follow-on project, Africare will begin to look seriously at the issue of government support and its importance in sustaining project results. Any documentation produced during the life of the project will be shared to the child survival community through such media as the CORE Group.

3. Program Monitoring and Evaluation (PME) Plan

Current Information System

There is a health information system in the target area, though it does not sufficiently generate quality data. At the community level, there are community own resource persons (CORPS) trained by BASICS II and PDCs trained by UNICEF. On a quarterly basis, they collect multi-sectoral data that include latrine coverage, water and sanitation, housing status, school children enrollment, immunization coverage, agriculture and household income. Over the last one year, the UNICEF country program introduced an additional tool to capture data on deaths/births for under-fives. This information is compiled on a monthly basis. The data collected are used to inform the district on key household practices, mortality and morbidity trends including community critical needs to use for planning. During phase I, in partnership with DISH II Project, the project focused on training health workers in data collection, interpretation/ analysis and use but there was no refresher training and follow up and support supervision. This was supposed to be done by DISH II, which phased out before end of the CIMCI project thus leaving some gaps in the HIS which CIMCI Plus will address.

At the health facility level, the Ntungamo Health Services uses the national MOH recommended HMIS forms. The forms capture data on care seeking of major diseases including those that relate to childhood illnesses (malaria, diarrhea, malnutrition, ARI and HIV-AIDS), health services utilization and human resources. Health workers collect data and send it to the health sub-district level. From the sub-district, it is sent to the district for basic analysis by the HMIS Officer and then to the MOH for detailed analysis and aggregation. On some occasions, health workers are provided with some skills to be able to use the data in decision-making. However, the health workers' skills are not adequate enough and yet information use is also affected by delayed feedback at the national level. In addition to the HMIS data, the district carries out weekly diseases surveillance on notifiable and epidemic potential diseases to avoid possible widespread of epidemics. There is also on going health facility assessment by the MOH with support from WHO on an annual basis. Africare will supplement information collected from facility assessments by conducting formative/operations research described in this document. Africare will, in addition, and where necessary use the data from health assessments to formulate appropriate strategies that reinforce implementation of the project.

Linkages Between Community and Facility Data

Currently, there is minimal linkage between the community level data and health facility data. CIMCI-Plus will create appropriate linkages between the two levels. Both community and health facility data will be reviewed during the quarterly DHT/partners meetings at the district level. To avoid collection of unnecessary and or overlapping data, CIMCI-Plus will use facility-based records and CHIS data for monitoring. For evaluation purposes, additional studies that include KPCs and other studies will be conducted.

A forum at the health facility level will be put in place where health workers and CORPs will meet biannually to share information and take appropriate action. CIMCI-Plus's CHIS will build upon the existing monitoring tool for PDCs developed in CIMCI phase I and on those developed

by UNICEF and BASICS II. PDC and CORPS will be responsible for data collection. The program will build the skills of PDCs and CORPs in the target area. Their training will include use of tools in data gathering, compilation and reporting. The CHIS tools will be modified to capture critical data with focus on children under-five and pregnant women such as bed net use and completion of immunization. Lessons learned will be shared with the central MOH and the NGO community for potential use and replication.

Monitoring and Evaluation Tools

CIMCI-Plus will use four major tools to monitor and evaluate the project progress: (1) Household KPC survey tools that will be used at baseline and final evaluation. The baseline KPC survey was done at the beginning of the project (January 2004) as part of the project start up activities. (2) LQAS, which will be used to monitor program results. Unlike in phase I, which used the midterm KPC, survey, CIMCI-Plus will employ this method by modifying the KPC tool and using a smaller sample size; (3) HMIS at health facility level to track health care-seeking behavior for intervention areas; and (4) CHIS to track behavior change at household and community levels.

In addition, special studies using simple qualitative and quantitative tools such as focus group discussions will be conducted to collect information on key areas critical to child survival. Information collected from such studies will be used to develop appropriate messages that overcome barriers to behavior change. Project staff particularly the monitoring and evaluation staff and health workers with external technical assistance will be trained in using tools such as LQAS to enhance quality of data. In order to obtain quality and/or reliable data, CIMCI-tailored PRA tools such as resource mapping will be used. Through community PRA, beneficiary communities will obtain information that will assist them in identifying locally available resources for use in addressing child health problems. By empowering beneficiary communities to participate in information collection, they will be able to participate in monitoring and evaluating project progress in their communities. Project staff and partners will be responsible to develop, modify and pre-test tools.

The KPC surveys and LQAS will fetch quantitative data focused on CIMCI-plus catch indicators under each of the five intervention areas. The HMIS tool will gather quantitative data on notifiable and potential epidemic diseases (cholera, dysentery, malaria, measles, neonatal tetanus, acute flaccid paralysis, suspected rabies, guinea worms, sleeping sickness, and plague). Data are compiled by health workers on a daily basis. The CHIS tools will be used to collect information on births and deaths, household practices and community needs. The information will be collected and updated by CORPS and PDCs on a quarterly basis supervised by health assistants. Health workers, CORPS, PDCs and project staff will be trained and/or refreshed on the application of relevant data tools from different sources and utilization to maximize decision making. Close supervision during data collection will be enhanced.

During phase I, the project developed the tool that captures process indicators to include; number of IEC materials distributed, health education sessions, home visits, drama shows mobile cinema shows and other project accomplishments. The Field Officers will, on a daily basis, use the tool from which quarterly and annual reports will be compiled and shared with the donor and other partners. Other reports will include baseline assessments; LQAS, operations research, detailed implementation plans and final evaluation.

The CIMCI Plus Project documentation, monitoring and evaluation plan will entail: (1) KPC household baseline survey at the beginning of the project (January 2004); (II) Midterm evaluation (using LQAS) that will be conducted after two and half years of project implementation (May 2006); and (III) Final evaluation that will be done in July 2008. Operations

and formative research activities will be conducted in the initial years of the project (second and third years) to enable the project generate data that can influence project implementation over the life of the project. In addition, the project will produce bi-annual newsletters, quarterly and annual reports that present project progress, successful stories and other related outcomes that will be used as part of monitoring and evaluation process.

Data Analysis and Dissemination Strategies

Data collected from KPC and LQAS surveys will be analyzed by the local hired statistician. Trained health workers will analyze data from the HMIS while the DHT and partners will review data from both HMIS and CHIS. Information will be shared through dissemination workshops organized immediately after data have been analyzed. Only key data will be disseminated and presented in a simple manner for easy interpretation to stimulate action at all levels. Consensus workshops will be organized to agree on the next steps. At community level, data will be disseminated in the local language in collaboration with NDHS. At the district level, data will be shared during the quarterly DHT meetings. At the national level, a network of child survival NGOs called Malaria and Childhood Illnesses Secretariat (MACIS) where Africare is the host has been created. This network, in partnership with the MOH, forms the fora for dissemination of key results of programmatic importance including replicability through conferences/workshops. Policy makers and other key decision makers will strategically be invited to attend such workshops to advocate for emerging issues that promote child survival.

Africare HQ will provide support for publication and the dissemination among other PVOs and the global child survival community. As during CIMCI phase I, the project will prepare bi-annual newsletters and circulate them widely among implementing partners. New experiences will be shared through appropriate national and international forums. CIMCI-Plus will continue to host national, regional and international visitors and the donor community to share experiences. Opportunities will be created for program staff at international levels to learn and disseminate experiences such as at CORE-organized meetings.

Monitoring and Evaluation Matrix

Ntungamo District Health Services Staff (NDHSS) = **1**; Project Field Staff (PFS) = **2**; Consultant Statistician (CS) = **3**; Baseline (BL) = **4**
Mid-Term (MT) = **5**; Final Evaluation (FE) = **6**; Ntungamo District Health Service (NDHS) = **7**; USAID = **8**; Ministry of Health (MOH) = **9**; Malaria and Childhood Illness Secretariat (MACIS) = **10**; NGOs = **11**; Communities = **12**; Field Officers (FO) = **13**; Research, Monitoring and Evaluation Officer = **14;** Behavior Change Communication Specialist (BCCS) **= 15;** District Health Management Information Systems (DHMIS) = **16;** Monthly = **17**; Quarterly **= 18**; Annual **= 19**; Bi-annual **= 20**

Indicator	Data Required	Data Tools	Data Collected By	Data Analyzed by	Reporting Freq	Circulation
Objective 1: To promote the knowledge and behaviors related to prevention of childhood illnesses at the household and community levels.						
Malaria						
1. Increase percentage of children aged 0-59 months who slept under an insecticide-treated net the previous night	Number of children 0-59 months of age who slept under an ITN previous night	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12
2. Increase the percent of mothers who took anti-malaria medicine to prevent malaria during pregnancy.	Percent of mothers who took ant malaria medicine to prevent malaria during pregnancy.	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12
Immunization						
1. Increase the percentage of children 12-23 months who received BCG before the first birthday.	Percentage of children 12-23 months who received BCG before the first birthday.	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12
2. Increase the percentage of children aged 12-23 months who received DPT3 vaccines before their first birthday.	Percentage of children aged 12-23 months who received DPT3 vaccines before their first birthday.	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12
3. Increase the percentage of children aged 12-23 months who received OPV3 before their first birthday	Percentage of children aged 12-23 months who received OPV3 before their first birthday.	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12
4. Increase the percentage of children 12-23 months who received measles vaccine before their first birthday.	Percentage of children 12-23 months who received measles vaccine before their first birthday.	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12
5. Increase the percentage of mothers who received at least two tetanus toxoid injections before the birth of their youngest child less than 24 months.	Percentage of mothers who received a t least two tetanus toxoid injections before the birth of their youngest child less than 24 months.	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12

Indicator	Data Required	Data Tools	Data Collected By	Data Analyzed by	Reporting Freq	Circulation
HIV/AIDS						
1. Increase the percentage of women of reproductive age citing that HIV/AIDS can be transmitted through pregnancy, delivery and breastfeeding.	Percentage of women of reproductive age citing that GHIV/AIDS can be transmitted through pregnancy, delivery and breastfeeding. who cite	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12
2. Increase the percentage of mothers with children <60 months who cite at least two known ways of avoiding HIV/AIDS.	Percentage of mothers with children <60 months who cite at least two known ways of avoiding HIV/AIDS.	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12
3. Increase the percentage of mothers with children <60 months who indicate that they can allow an HIV positive child to play with theirs.	Percentage of mothers with children <60 months who indicate that they can allow an HIV positive child to play with theirs.	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12
Nutrition, Micronutrients & Breastfeeding						
1. Increase percentage of children 0-6 months that were exclusively breastfed.	Percentage of children 0-6 months that wee exclusively breastfed.	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12
2. Increase in the percentage of children 0-23 months who were breastfed within the first 60 minutes of delivery.	Percentage of children 0-23 months who were breastfed within the first 60 minutes of delivery.	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12
3. Increase the percentage of mothers who indicate that children should be exclusively breastfed for six months.	Percentage of mothers who indicate that children should be exclusively breastfed for six months.	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12
4. Increase percentage of children 6-59 months who were fed on vitamin A rich foods the day before the survey.	Percentage of children 6-59 months who were feed on vitamin A rich foods the day before the survey.	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12
5. Increase the percentage of children 12-23 months that continue being breastfed.	Percentage of children 12-23 months that continue being breastfed.	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12
Control of Diarrheal Diseases						
1. Increase percentage of households with designated hand washing facilities with soap/ash present that mentioned the importance of washing hands after defecation to prevent diarrhea.	Percentage of households with designated hand-washing facilities with soap/ash present that mentioned the importance of washing hands after	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12

Indicator	Data Required	Data Tools	Data Collected By	Data Analyzed by	Reporting Freq	Circulation
	defecation to prevent diarrhea.					
Objective # 2: To improve home management of the sick child by promoting timely and appropriate care seeking at the household and community levels						
Malaria						
1. Increase percentage of children 6-59 months with fever that were given same or more fluids.	Percentage of children 6-59 months with fever that were given same or more fluids.	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12
2. Increase percentage of mothers with children <60 months who reported giving chloroqiune and fansidar to febrile children at home	Percentage of mothers with children <60 months who reported giving chroloquine and fansidar to febrile children at home.	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12
3. Increase the percentage of children 6-59 months that were given same or more solid/mashed foods during sickness.	Percentage of children 6-59 months that were given same or more solid/mashed foods during sickness.	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12
4. Decrease percentage of children 0-59 months who were taken for millet extraction.	Decrease percentage of children 0-59 months who were taken for millet extraction.	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12
Control of Diarrheal Diseases						
1. Increase percentage of Diarrheal sick children 6-59 months that were given same or more solid/mashed food.	Percentage of Diarrheal sick children 6-59 months that were given same or more solid/mashed food.	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12
2. Increase percentage of Diarrheal sick children <60 months that were given same or more fluids.	Percentage of Diarrheal sick children <60 months that were given same or more fluids.	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12
3. Increase percentage of children <60 with diarrhea in the last two weeks who were treated with ORS.	Percentage of children <60 with diarrhea in the last two weeks who were treated with ORS.	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12
4. Increase percentage of mothers with children <60 who can identify at least two signs requiring treatment.	Percentage of mothers with children <60 who can identify at least two signs requiring treatment.	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12
5. Decrease percentage of children 0-59 months who were taken for false teeth extraction.	Decrease percentage of children 0-59 months who were taken for false teeth extraction.	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12

Indicator	Data Required	Data Tools	Data Collected By	Data Analyzed by	Reporting Freq	Circulation
Objective # 3: To improve accessibility of under five children and women of reproductive age to qualify health services and produces, both at the facility and community levels						
Malaria						
1. Increase the number of ITN outlets in the project area.	Number of ITN outlets established in the project area.	Supervisory reports and field officers reports.	13, 14	14	17	7, 8, 9, 10, 11 12
HIV/AIDS						
1. Increase percentage of mothers with children <60 months who go for HIV testing.	Percentage of mothers with children <60 months who go for HIV testing.	KPC surveys, LQAS and FGDs	1, 2	3	4, 5, 6	7, 8, 9, 10, 11 12
2. Increase number of condoms distributed in the project area.	Number of condoms distributed in the project area.	Supervisory and field officers reports.	13, 14	14	18	7, 8, 9, 10, 11 12
3. Increase the percentage of mothers in the project area receiving PMTCT services.	Percentage of mothers in the project area receiving PMTCT services.	HMIS reports from Health facilities, project supervisory report	14, 16	14, 16	18	7, 8, 9, 10, 11 12
Objective # 4: To strengthen National (MOH) and district capacity to replicate and sustain CIMCI						
1. Capacity building for 40 Sub-county trainer, 900 CORPS, 100 PDCs, 7 CBOs , 84 immunization mobilizers, 150 TBAs, 100 water user committee members, 48 CCAs, 21 women/drama groups, 60 health workers.	The number of the specified structures trained and active.	Supervision and Field officers reports	15, 13,14	14	18	7, 8, 9, 10, 11 12
2. Documentation of project lessons and experiences through bi-annual newsletters (8) quarterly reports (20) and annual reports (5)	Number of bi-annual newsletters, quarterly reports and annual reports produced.	Field officers reports, KPC surveys, HMIS, Operation and formative research findings.	13, 14, 16	14	20, 18, 19	7, 8, 9, 10, 11 12
3. Technical backstopping visits by country office and head quarter's staff.	Number of visits made by country.	Quarterly and annual reports.	14	14	18, 19	7, 8, 9, 10, 11 12
Others						
1. Home visits (5450), health education sessions (7000)), drama presentations (800) IEC materials	Number of Home visits, health education sessions,	Quarterly and annual reports	13, 14	14	17, 18, 19	7, 8, 9, 10, 11 12

Indicator	Data Required	Data Tools	Data Collected By	Data Analyzed by	Reporting Freq	Circulation
distributed (30,000)	drama presentations IEC materials distributed					

Strengthening Health Worker Performance and Quality of Services

The MOH, with other partners such as WHO, will continue to strengthen health worker performance through IMCI training in case management, provision of treatment guidelines and support supervision. At the district level, the MOH will provide overall coordination between partners and will ensure that the needs of health facilities in terms of manpower, equipment and supplies are adequately available. Sub-district Medical Officers (MOs) will provide support to the lower level health facilities and will conduct regular support supervision. Both quantitative and qualitative data that Africare will collect through KPCs, LQAS, and CHIS will be shared in a timely manner with health workers to identify areas that will enhance their monitoring role. CIMCI-Plus will, in target communities, complement this effort through training of health workers in interpersonal communication skills, use of data at the health facility level and training in community IMCI.

CIMCI-Plus, in collaboration with the NDHS, will adopt MOH recommended training manuals including other manuals developed by CSTS and CORE to promote quality of services. To maintain the quality of training, on job training approach will be used, protocols to reinforce consistency of training will be followed, pre- and post-tests to measure the immediate effect of training will be conducted. Evaluation results will serve to refine training materials. Lessons learned from using existing materials will be shared with the national level and other partners. Africare will continue to conduct special studies that enhance the linkages between health facilities and communities.

Africare will exploit partnerships for increasing access of limited essential supplies such as ITNs. The Project will facilitate linkage of communities with the distribution agencies such as Population Services International (PSI) and Quality Chemicals Limited. Critical to the success and the sustainability of the entire CIMCI-Plus project is the ability of the M&E system to monitor progress made in building the capacity of local partners. Africare through its staff trained in ISA will use the ISA methodology to support capacity building efforts of field project staff and the Ntungamo district health workers. Other partners whose capacity will be strengthened will include Uganda Red Cross Society and CBOs at the Sub-county levels to coordinate and sustain CIMCI activities. Their capacity will be built through joint planning and implementation including organizing training sessions for them. Successful application of capacity building tools will be shared at the national level with the MOH and NGO partners for replication. In addition to ISA, capacity building will include training in HH/CIMCI framework, 16 key HH behaviors, practical implementation approaches, monitoring, documentation, planning processes and resource mobilization for CIMCI.

Operations Research

As part of monitoring and evaluation function, the project will integrate operations research (OR) in its design to obtain information critical to enhance behavior change. During CIMCI phase I, Africare studied and quantified the immediate effect of CIMCI on facility utilization, revealing an increase of 97%. CIMCI-Plus extension provides an excellent opportunity to monitor this effect over time, for projecting facility and other needs. CIMCI-Plus will look at qualitative factors influencing care-seeking patterns for dangerous practices such as millet and tooth extraction, from client and traditional healer perspectives, to provide information for development of BCC strategies to address these practices. PRA will be a key methodology in the studies that will be undertaken to gather qualitative data

4. WORKPLAN: OCTOBER 1, 2003 – SEPTEMBER 30, 2008

Major Activities	Target	Activity Focus	Time Frame																				Personnel[1] Responsible	Status
			Year 1 by Quarter				Year 2 by Quarter				Year 3 by Quarter				Year 4 by Quarter				Year 5 by Quarter					
			1	2	3	4	1	2	3	4	1	2	3	4	1	2	3	4	1	2	3	4		
Objective 1: Promote knowledge and behaviors related to prevention of childhood illnesses at the household and community levels																								
Household																								
1. Conduct household visits	5.450	BC	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	1, 2, 3	On-going
2. Organize household competitions	14	BC					x	x	x	x	x	x	x	x	x	x							1, 2, 4	
3. Conduct KPC baseline survey	1	BC	x	x																			4, 5, 6, 7 , 9	Achieved
4. Conduct mid term KPC survey	1	BC											x										4, 5, 6, 7, 8, 9	
5. Conduct final KPC survey	1	BC																			x		4, 5, 6, 7, 8 ,9	
Community																								
1. Community mobilization through: • Drama • Film shows • Health education	 500 250 5,000	BC	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	2, 4, 10, 12	On-going
2. Organize sub-county stakeholders sensitization workshops	7	BC			x																		4, 10	5 workshops held
3. Identify community structures to work within the implementation	9	BC	x																				1, 4, 10	Achieved
4. Disseminate KPC results to: • Sub county staff • District level staff	 350 70	 BC BC			X x	X x	X x	X x															4, 10	On-going
5. Modify and adapt CHS tools	2	Q, BC				x	x																4, 10	
6. Support supervision and follow	140	Q, BCC					x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	4, 10	

[1] **BC** = Behavior Change; **Q** = Quality; **A** = Access; Field Officer = **1**, CORPs = **2**, Health Workers = 3; NDHS = Ntungamo District Health Services = 4; Africare Headquarters = **5**; Country Office = **6**; Statistician = **7**; External Consultant = **8**; Africare Field Office **9**; Africare Field Office Staff = **10**; Makerere University = **11**; Drama Group = **12**; Agricultural Extension Officers = **13**; Women Groups = 14; Vet Officers = **15**; Fisheries Extension Officers = **16**; The Aids Support Organization = **17**; AICM = **18**; District Health Inspectors = **19**; Ministry of Health = **20**; Implementing Partners = **21**; Parish Development. Committee = **22;** District Water Eng. = **23; Ntungamo District Local Government = 24;** Malaria and Childhood Illness NGO Secretariat = **25;** Sub-county Trainers **= 26**

Major Activities	Target	Activity Focus	Time Frame																				Personnel[1] Responsible	Status
			Year 1 by Quarter				Year 2 by Quarter				Year 3 by Quarter				Year 4 by Quarter				Year 5 by Quarter					
			1	2	3	4	1	2	3	4	1	2	3	4	1	2	3	4	1	2	3	4		
up visits to trained structures and staff																								
Objective 2: Improve home management of the sick child by promoting timely and appropriate care seeking at the household and community levels																								
Household																								
1. Educate mothers and caretakers on proper preparation of ORS, tepid sponging and appropriate feeding practices during childhood illness	42,911	BC		x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	1, 2, 3, 4, 10, 12, 21	On-going
2. Operations research on factors that influence health care patterns for harmful folk "diseases" (millet and false teeth extraction)	1	BC					x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	4, 10, 11	
Community																								
1. Community mobilization through • Drama shows • Home visits • Health education sessions	 500 5,450 5,000	BC		x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	4, 10, 12, 14	
Health Facility																								
1. Conduction formative research on why health workers are not consistent following routine immunization outreach schedules	1	BC							x								x						4, 10, 11	
2. Train health workers in the use of data at the facility level to improve linkages between health units and communities	60	BC, A, A						x	x								x	x					10, 11	
3. Bi-annual health workers, PDCs and CORPS meeting at sub-county level to share experiences on home practices and care seeking	6	Q, A							x		x		x		x		x		x				2, 3, 10, 22	
4. Train project staff and health	2	Q, BC						x	x														8	

Major Activities	Target	Activity Focus	Time Frame																				Personnel[1] Responsible	Status
			Year 1 by Quarter				Year 2 by Quarter				Year 3 by Quarter				Year 4 by Quarter				Year 5 by Quarter					
			1	2	3	4	1	2	3	4	1	2	3	4	1	2	3	4	1	2	3	4		
workers in LQAS methodology																								
5. Modify KPC questionnaire to use at mid- term evaluation, health facility and other assessments	1	Q, BC					x	x	x	x													10, 11	
District																								
1. Quarterly DHT and partners review meetings	14	A, Q						x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	9	
Objective 3: Improve accessibility of under-five children and women of reproductive age to quality health services and products, both at the facility and community levels																								
Household																								
1. Establish backyard and front yard gardens to improve vitamin A in-take	4,200	A							x		x		x		x			x					9, 13	
2. Promote and demonstrate the use of locally improved hand washing facilities	400	A, BC						x	x	x	x	x	x	x									2, 9, 13	
Community																								
1. Support formation of mosquito net clubs	21	A, BC		x	x	x	x	x	x	x	x	x	x	x	x	x	x						2, 9, 14	
2. Support to child health days	6	A BC					x		x		x		x		x		x						9	
3. Promote and distribute condoms	50,000	A		x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	2, 3, 9	On-going
4. Support to dipping and re-dipping of mosquito nets	4	A, BC, Q			x		x		x		x		x				x		x				3, 9	On-going
5. Establish links with private ITNs suppliers to access subsidized ITNs at sub-county level	7	A			x	x	x	x	x	x	x	x	x	x									9	
6. Establish rabbit breeding centers fish ponds to improve protein in-take	5	A, BC							x	x	x	x	x	x									9, 15	
7. Construct shallow well springs and water tanks to improve hygiene and sanitation	70	A							x	x	x	x	x	x		x							3, 9, 23	
8. Distribute ORS at community	50,000	A			x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	2, 3, 9	On-going

Major Activities	Target	Activity Focus	Time Frame																				Personnel[1] Responsible	Status
			Year 1 by Quarter				Year 2 by Quarter				Year 3 by Quarter				Year 4 by Quarter				Year 5 by Quarter					
			1	2	3	4	1	2	3	4	1	2	3	4	1	2	3	4	1	2	3	4		
level																								
9. Strengthen immunization outreaches through joint planning with NDHS	10	A		x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x			2, 3, 9	On-going
Facility																								
1. Advocate for improved IMCI essential drugs supplies at health facility level	10	A			x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x			9	
2. Support to V CT and PMCT outreaches through awareness creation by referring mothers to health facilities	VCT= 490 PMTCT=210	A		x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	9	
District																								
1. Support national malaria days at the district level	3	BC						x				x				x							9	
2. Participate in the World AIDS day	5	BC	x			x			x			x				x				x			9	
Objective 4. Strengthen national (MOH) and district capacity to replicate and sustain the community IMCI approach																								
Community																								
1. Train CORPS in CIMCI intervention areas, mobilization and communication skills	900	Q, BC					x	x	x	x	x	x											4, 9	
2. Orient community structures, rabbit raising, aquaculture and vegetable growing	9	Q, BC							x	x	x	x	x	x	x								9, 13, 15, 16	
3. Train and work with drama groups (2 per sub county) at community level and 1 school based per sub-county)	21	BC			x	x	x	x	x	x	x	x												
4. Train parish immunization mobilizers	84	Q, BC						x	x	x	x	x											4, 9	
5. Train CCAs in mobilization and communication skills for VCT and PMTCT services	48	Q, BC						x	x	x	x	x	x										4, 9, 17, 18	
6. Train PDCs in CIMCI	100	Q, BC						x	x	x	x	x	x										4, 9	

Major Activities	Target	Activity Focus	Time Frame																				Personnel[1] Responsible	Status
			Year 1 by Quarter				Year 2 by Quarter				Year 3 by Quarter				Year 4 by Quarter				Year 5 by Quarter					
			1	2	3	4	1	2	3	4	1	2	3	4	1	2	3	4	1	2	3	4		
intervention areas, mobilization and communication skills																								
7. Training TBAs in CIMCI intervention areas, mobilization and communication skills	150	Q, BC								x	x	x	x										4, 9	
8. Train water user committee members in water source maintenance and resource mobilization	100	Q, BC									x	x	x										9, 19	
9. Train of CORPS(900) and PD's (100) in data gathering, compilation, reporting and utilization	1,000	Q, BC						x	x	x	x												9	
Health Facility																								
1. Train health workers in CIMCI and interpersonal communication	60	Q																					4, 9	
District																								
1. Sign MOH with Ntungamo District	1				x																		6, 9, 24	Achieved
2. Training of trainers (TOT) for sub-county trainers	40	Q				x																	9	
3. Build capacity of selected CBO at sub-county level to integrate CIMCI Plus activities in their agenda	7	Q																x	x	x	x		9	
4. Organize cooking demonstrations	21	Q									x		x		x		x		x				9	
5. Review and adapt the training materials	5	Q				x																	4, 9, 26	
6. Prepare activity quarterly activity reports	15	Q	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	9	
7. Prepare and compile activity annual reports	5	Q				x				x				x				x				x	9	
8. Local partners and staff skills assessments	2	Q						x	x	x	x	x											5, 9	
9. Bi-annual production of	8	BC				x		x		x		x		x		x		x		x			9	

Major Activities	Target	Activity Focus	Time Frame																				Personnel[1] Responsible	Status
			Year 1 by Quarter				Year 2 by Quarter				Year 3 by Quarter				Year 4 by Quarter				Year 5 by Quarter					
			1	2	3	4	1	2	3	4	1	2	3	4	1	2	3	4	1	2	3	4		
CIMCI-Plus News letters																								
10. Headquarter support to production of project publications	5	BC, Q				x				x		x				x		x		x			5	
11. • HQ technical backstopping to the project • Country Officer technical backstopping to the project	5 10	Q	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	5, 6	On-going
12. Monthly staff planning and management meetings	40	Q	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	9	
13. Documentation of project experiences and lessons learned		BC, Q	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	x	9	On-going
14. Phase over and phase out planning meetings • District • Sub-county	1 7															x	x	x	x	x	x	x	2, 4, 9	
15.. Project staff development through • Short courses • Workshops • Meetings • Exposure visits	2 15 10 2	Q, BC		x		x			x			x		x		x		x		x			9, 20, 21, 25	

Annex 1: Response to Application Debriefing

Submission Category: Cost Extension

	Budget Information	*Response*
Strengths	PVO has provided an excellent detailed description of anticipated costs. They also demonstrate good fiscal management of current *(phase I)* as per pipeline analysis/budget variance and most recent Form 269A provided	Africare will maintain openness, cost effectiveness and transparence in both expenditures and accountabilities
Weaknesses	While phase-in/out is budgeted with fund decreasing in the final two years, decrease per year is minimal. Although consultant costs are budgeted for baseline and final KPC, it is difficult to determine if other costs related to KPC are budgeted. It is not necessary to do a mid-term KPC. There is no evidence that this is budgeted for but it is mentioned in the M&E framework	KPC survey costs are included in the budgets. Africare will explore other methods such as LQAS to carry out the midterm review
	Executive Summary and overall Application	
Strengths	This is a well articulated and organized summary of current health status country/district; focused plan presented with clear goals; good description of how proposal fits into USAID mission SOs and partner activities. Excellent achievement is demonstrated in promotion and GoU adoption of IMCI components 1,2 (at central level), and 3 (at district level). The applicant provides quotes from MoH illustrating buy– in for and ownership of current and proposed projects.	The project will continue to maximize results
Weaknesses	In presenting data regarding achievements it would be more useful to present actual baseline and evaluation data rather than "…has increased by 97%". If baseline was 5% an increase to 10% is still not very good even through it is a 100% increased.	The project will emphasize the recommended reporting

	Description of the PVO Applicant	*Response*
Strengths	Africare demonstration impressive accomplishments to date in this area of Uganda, particularly in terms of scheduled programming of substantial inputs, partnership development, capacity building of local stakeholders, and strategic and useful documentation and dissemination activities/outputs. Thoughtful planning and strategy are evidenced by progress made in responding to all major MTE recommendations. Many steps taken have already resulted in impressive accomplishments The confidence of MoH in Africare's work is an extremely positive endorsement. Additional assistance to ensure a regular supply of essential medicines may be needed. The challenge of increasing demand of services and the insufficient facilities/health care workers available to meet that demand will need to be addressed. Also the communications channel created by WorldSpace may be difficult to replace	Through advocacy and continued partnership with the MOH district the project will continue to further enhance partnership to ensure consistent supplies with view to meeting community demand
Weaknesses	While action has been clearly taken in response to recommendation #2 (joint planning with NDHS), It would be interesting to know if the recommendation of joint quarterly meetings for purposes of budget/expenditure and programmatic activity reviews, and bi-annual planning has played out as appropriate and is consistent with current activity.	The district incurs related DHT joint quarterly review meetings costs. Africare being a member will be always invited to attend. The activity thus remain important for phase II
	Situation Analysis	*Response*
Strengths	The situation analysis was well presented highlighting the PVO's focus on local partnership and capacity building during initial round funding. The use of existing MoH structure and staff are very positive signs in terms of sustainability	The project will maintain it's high level partnership building to increase progress enhancing networks at all project levels

	Excellent process of site selection and project design were described. All levels and players were included and additional efforts were made to collect information at the community level through PRA. Eight letters of support from key stake holders and identified partners are provided most confirm, without a doubt, satisfaction with Phase I and commitment to Phase II based on comparative advantage of each. They are not generic letters.	
Weaknesses	With reference to current health status in district, Page 6: It appears that a baseline (KPC) was already conducted in the proposed extension area as data source of many indices cite baseline (KPC) in this is NOT a weakness, but it is not entirely clear if a baseline has already been done in the proposed area as part of Phase I	Some baseline data at proposal writing stage was obtained from the CIMCI phase one KPC survey on one hand and from international documents with generic indicators like CORE/CSTS. However, the baseline data in this DIP has been revised based on CIMCI-Plus KPC survey
	Program Strategy and Interventions	
Strengths	The obvious emphasis on involving key stakeholders in the process of site and intervention selection is commendable. PVO has made the important decision to add immunization as a strategy in proposed round two of funding, as there has been marked decline in coverage in project area, which is grave concern. Proposed strategies demonstrate an understanding of local cultural practices and perceptions and effort to address these with appropriate BCC messages. The proposal also clearly explains why certain strategies are not proposed in the cost extension. An excellent training strategy is outlined including beginning with training needs assessment, follow-up and supportive supervision post-training to ensure actual implementation of knowledge gained. Applicant includes a good phase-in/out implementation strategy.	Through the M&E system, the project conduct on going assessments that will address the aforementioned challenges

	The applicant also identifies clearly what hasn't (necessarily) worked in Phase I BCC strategy (i.e., classical training of shopkeepers and THs) and takes steps to rectify the approach and identify effective BCC approaches and channel (i.e., testing of SARA's 'negotiation approach' with the same two groups). There is good recognition of the challenge and constrains including a shortage of local providers which may continue to be a hindrance to success of program; effecting private sector drug sellers and irrational drug use may also continue to be difficult.	
Weaknesses	It would have augmented this segment if applicant had included more about the MoH 2001 MTCT prevention strategy. It will be strategic to coordinate, at least in early stage of proposed project, with MTCT experts/project/studies, notably operating in Southern African Region. In General, HIV/AIDS intervention poses extra challenges due to issues of stigma (and could be considered a programming challenge unto itself) that requires unique approaches that have been field-tested are proving effective. Because Africare is somewhat young in this area of HIV/AIDS programming, it would be wise to have at least listed resource groups with whom to collaborate/learn from	The project intends to partner with AIM, TASO and AIC to ably implement the MTCT component
	Organization Development	
Strengths	Africare clearly has a deliberate approach to capacity building, which starts with 'GLOBAL' capacity building priorities. Capacity building approach at the country level (Uganda) is in line with and driven by MoH National Policy on Public Private Partnership. This provides an excellent framework through which to identify priority capacity needs, builds on existing capacities/strengths, and provides relevant assistance in meeting needs and attaining sustained capacity. Applicant makes very good	Africare intends to explore the use of ISA tools as earlier proposed

	use of ISA to examine its own capacities, restructuring to address realities of HIV/AIDS	
Weaknesses		
	Performance Monitoring and Evaluation	*Response*
Strengths	PVO demonstrates good integration with existing information system and data and very good use of KPC and other baseline information to develop realistic indicators. This proposal contains a more realistic and manageable number of indicators than round one. It would be advisable to ensure that local staff develops capacity to create indicators themselves. The CHIS is an excellent idea although it may be challenging. The assumption is that the project has knowledge of success elsewhere. PVO may need additional assistance/partnerships for cost analysis operations research plan. While current M&E system sounds almost purely facility-based, lack of community-based data is addressed/rectified in Phase II. M&E plan contains excellent ideas for operations research finding and results from studies will go far in furthering institutionalization of IMCI in Uganda.	Operations research activities will be maintained to identify key areas for documentation to guide implementation process
Weaknesses	A KPC is not usually done at midterm and may be an unnecessary cost although it is mentioned repeatedly in the results framework. It would probably be better to use a modified questionnaire and LQAS to monitor program results during the project and use the full KPC instrument at baseline and final evaluation. Indicator 1.2 seems to be one that should incorporated into CHIS and/or HMIS, not only project baseline, midterm and final surveys (as per measurement methods) Where LQAS is mentioned as a management method (i.e., indicators 1.3 and	The CIMCI project will explore the possibility of using LQAS methodology at Midterm as recommended

	1.4), it is not clear if this implies that these indicators will be routinely or periodically monitored using LQAS 'methodology' or whether LQAS 'methodology' will be used and incorporated into baseline, midterm and final surveys for data collection on immunization.	
	Management	*Response*
Strengths	The organizational structure is adequate with clear lines of reporting and communication. The plan (supported by many PVO experiences) for field Offices to be based in the communities that they service is excellent Real time financial interface between HQ and country offices increases assurance of timely and responsive fiscal management and is an excellent use of IT	The structure will be maintained though it may be modified based on the ISA results and or expansion of program through complementary funding
Weaknesses		
	Collaboration with USAID Field Mission	
Strengths	Although no letter of support included, there is clear evidence of consultation with USAID mission	
Weaknesses	Letter of support not included from USAID mission in Uganda, but this is not a requirement as per RFA guidelines.	Indeed, the letter was not required at the time of application submission. Should it be needed, Africare is confident that it will be provided because of over five years smooth relation ship Africare has had with the Local Mission

Annex 2: Response to Final Evaluation Recommendations

Recommendations

1. Project objectives and indicators:	*Response*
The project staff should develop project objectives and indicators that are appropriate and achievable. They must include the core project objectives while incorporating the complementary programs, which enhance the impact of the Child Survival initiative. An excellent lesson was learned after the Mid-Term Evaluation and the recommendation to revise and reduce the number of indicators. This revision did, however, cause some difficulty in the Final KPC. It is better to propose an achievable number of concise objectives than to set project targets too high.	Due to two additional interventions of HIV/AIDS and immunization, the number of objectives had been increased from 19 at final evaluation to 27 in phase II.
2. Increase utilization of the District Health Services:	
Africare's membership on the District Health Team has made the C-IMCI project an integral part of the District's Health Plan. The relationship between MOH and Africare staff is strong at all levels. It is essential to the continued success of the project to sustain this partnership and to design Action Research that will be valuable to District Health Services and the Project. It is also essential to the success and sustainability of the C-IMCI initiative that the District Health Team has ownership of the project and provides increased monitoring and supervision support. The PDCs must have strong ties to the District Health Services in order to access support for community-based initiatives. The PDCs work with Africare will form a stronger bridge to the NDHS.	It's evident that through partnership with the district health team and workers made CIMCI phase 1 vibrant and prepared the ground for sustainability through integrating MoH programs in the project's implementation process at all levels. Community structures like PDCs and TBAs were supported and guided through meetings, follow-ups and register courses by the district directorate of health services. The directorate's staff got involved in training, research studies and workshops organized by the project. These initiatives will be maintained or improved.
3. Resident Field Officers: At the sub-county level, the implementation of Africare's project has been comprehensive and far-reaching. The installation of a resident Field Officer has been important in the provision of services and has	CIMCI –I communities felt were part of the program as staff resided within the project target areas. It was crucial especially for better service delivery and commitment to the

shown the project's commitment to the communities it serves. Daily commuting from the project's district headquarters would diminish the project's "hands on" interaction and the perception of Africare's investment in the target communities. With the project's expansion into Phase II the evaluators recognize the constraints and hardships placed on staff as they relocate to more remote areas of the District, but it is recommended that Field Officers remain stationed in the project sub-counties.	communities served. Interactions ensure continued sensitization and equipping communities with new information about their health, so regardless of the constraints faced, field staff will remain within the communities they serve.
4. Complementary Programming:	
As noted many times in the Final Evaluation document, high praise must be given to Africare for their identification of important health needs, their recognition of potential links and sources of supplemental funding and their ability to meld the behavior change message with tangible inputs to sustain good health. It is strongly recommended that Africare continue to share the lessons it has learned through these supplemental projects and document the impact to enhance their ability to obtain future funding and sustain existing programs.	Fulfillment of the project objectives became an innovation through the identification of the importance of community health needs by identifying possible potential complementary projects by establishing links with funders to supplement the CIMCI activities of new and tangible inputs to ensure good health among the benefiting communities. Through such complementary projects like; Water for child health, Title II - Food for peace and WorldSpace HIV/AIDS Initiative, the impact made was partly attributed to their activities thus Africare will continue to seek and identify donors to obtain funds to maintain the trend for continued success of existing programs
5. Phasing-in at the Parish Level:	
The new project areas are large and diverse. It is recommended that the project initiate activities at the Parish level in a phased manner (i.e. 2-3 Parishes per year) in each sub-c ounty. This "phasing-in" of Parishes would increase the effectiveness of the capacity building, training, interaction, monitoring and supervision activities related to the PDCs and CORPs. It would also decrease pressure on staff and provide an opportunity to provide additional support to	The phasing- in strategy successfully worked in the CIMCI-I to enable the field staff cover the project areas. 70% of concentration and time should be spent in 2 – 3 parishes in the CIMC- II whereas 40% in other parishes. This will maintained to increase effectiveness to complete planned activities, reduce the workload and pressure on staff, and

CORPs and PDCs in need.	create ample time for additional support to CORPS/PDCs.
6. Recognition of Community Volunteers:	
Africare has successfully worked closely with CORPs, a cadre of community members initially identified and trained by the district through UNICEF. The utilization of this group of trained individuals is important to the practical management of the project. With sub-counties covering large geographic areas and the number of villages in each sub-county numbering in the hundreds, the use of CORPs in community training at the Parish level is appropriate and manageable. The project must, however, ensure that the PDCs are fulfilling their responsibilities and maintaining their level of training through periodic refresher training and the introduction of new information as it becomes available. The level of commitment of each CORPs differs from person to person. It is recommended that each CORPs be recognized for their services to the project and community through a certificate of appreciation and public recognition. Each CORPs should also receive a certificate at the completion of each training. These small and inexpensive tokens provide an excellent incentive to continued work, and increase the status of the individual on a personal and community level. The utilization of the project's quarterly newsletter to highlight and interview outstanding CORPs would also provide an excellent motivation and incentive to the work of the volunteers in the project.	CORPS were a strong base for CIMCI-I project. Orientation and equipment of this cadre of resource persons to carry out home visits, health sessions and mobilize communities, paved way for the continuity and visibility of the project in the project areas. Although CORPs fulfilled their responsibilities of spreading messages to the communities, there is still need to empower them through refresher trainings, recognition, provision of stationary, badges, caps and certificates. Such small presents/tokens mean a lot and motivate them for voluntary service and commitment to the project. The project will explore the possibility of motivating them as recommended.
7. Action Research:	
A key component of the first C-IMCI project Action Research was one of the	Action research component is responsible for documentation,

program's triad including BCC and the Informal sector component. Action Research was responsible for documenting project for documenting project experiences, standardizing monitoring and evaluation tools and expanding the role of PRA in the project area. The position of Action Research Officer was filled during the Mid-Term Evaluation and the importance of the position and its achievements were noted. Since March, 2002, the position of Action Research Officer has been vacant and the responsibilities have fallen to the Project Coordinator. The Project Coordinator is also responsible for the administrative and Human Resource activities related to the C-IMCI project as well as the five supplemental project supporting C-IMCI activities. The Coordinator is also called upon, with field staff, to develop proposals in support of the Ntungamo program. The expansion of activities in Ntungamo District has had a great impact on the Coordinator's ability to work closely with Action Research activities. It is strongly recommended by the Final Evaluation Team that the position of Action Research Office be filled and that the role of the Officer be expanded to provide technical assistance to the Field Officers and CORPs in the production of quantitative monthly and quarterly reports to supplement the existing narrative reports. The Action Research Officer should also create a standardized monitoring and evaluation tool that can be used at all levels, with all line ministries and will be consistent between projects.	monitoring and evaluation of the project activities. The action research officer position is therefore important and will be maintained for CIMCI-II. This position has been filled now in the title of M&E Officer. With support from staff and partners, monitoring tools will be harmonized to fetch correct and usable data.
8. Continued documentation of C-IMCI impact:	
The impact of the OTA study on the recruitment of additional health personnel and the increase in essential drugs provided to Ntungamo District Health Centers proved the power and importance of Action Research. As stated earlier,	Documentation in action research spells out achievements and uncompleted set targets of CIMCI. It identifies gaps to foster improved service delivery among partners and Service

the strong Action Research component of the C-IMCI project has created a unique opportunity to obtain solid data for utilization in C-IMCI projects not only in Uganda, but world-wide. Documentation of the impact of C-IMCI on traditional practices like "millet" and "false tooth" extraction, the practices surrounding lacteal fluids, herbs used in the treatment of diarrheal disease and malaria, the impact of HIV on breastfeeding practices and village level disease surveillance are a few possible areas of Action Research. It is recommended that essential and exciting research be continued and supported by the Africare Ntungamo C-IMCI project.	providers in the project areas. Action research activities are essential and will continue being supported for monitoring of the project's progress and for better results
9. Collaboration with line ministries (i.e. the Ministry of Local Government, the Ministry of Agriculture, Animal Industries and Fisheries, etc.) and other organizations:	
Africare must be commended for their close collaboration and coordination with other key partners in the provision of services to the people of Ntungamo. Interviews with collaborating agencies (i.e. BASICS II and WHO) indicated strong support and interaction at the national and local levels. However, interviews with sub-county and district leaders indicated an even greater need for collaboration at all levels with health professionals and ministry extension staff to ensue that the work of the project did not overwhelm the field staff. This is especially true in the introduction of rabbit rearing and fish ponds. Many community members stated that the Ministry of Agriculture, Animal Industries and Fisheries extension staff were not involved in providing technical support or monitoring of these projects even though the communities required addition access to information, medication and support. It is commended that Africare's Ntungamo C-IMCI project continue to build strong relationships at all levels in collaborating ministries in order to ensure continued coordination and support of activities and to avoid duplication of services.	The creation of the Uganda NGO Secretariat for Child Survival, where Africare is a host will enhance this partnerships
10. Informal Health sector:	

Although the debate continues internationally on the importance and utilization of health providers in the informal sector, data from the project's final KPC indicates that the most common home treatment for diarrheal disease was herbs (69.2%) and that approximately 22% of children who were taken outside the home for treatment of diarrheal disease were treated at a shop drug/shop/traditional healer or family member/elder. The KPC also found that although there has been a decrease in "False Tooth" extraction, 10.5% of mothers had taken their child under 24 months for the treatment." This information, in conjunction with the findings that within the community, mothers continued to consult family members (80%) before medical doctors and community health workers (20%) emphasizes the importance of community referral for IMCI and the continuing need for increasing the knowledge and skills of the informal health sector while recruiting them as valuable partners in C-IMCI initiatives. This has been proven by the project in the utilization and training of TBAs in growth monitoring activities. It remains essential to provide training to shop keepers and traditional healers.	The utilization and importance of informal health providers is still high as the final KPC data of CIMCI-I indicate (80% of mothers consult family members and 69% use of herbs in the treatment of diarrhea) is evident that communities still lack information for use of modern health services. Therefore emphasis will be aimed at improving the informal health providers skills through trainings especially the TBAs to engage them in good health practice for child survival.
11. Insecticide Treated Nets:	
Collaboration with PSI, UNICEF and the Uganda Red Cross has expanded access to ITNs within the project area and has been invaluable to the great success in achieving one of the key project malaria control objectives (3.6% to 11% of children under 5 sleeping under a bed net). This collaboration is especially important in the rural communities of Ntungamo which would not have access through conventional marketing systems. It is strongly recommended that these collaborations continue, as funding permits, and that the project investigate additional avenues to	Although ITN affordability and accessibility have been addressed in CIMCI-I in collaboration with PSI, UNICEF and URCS, there is still need to identify and link up with other ITN manufacturers like quality chemicals Ltd and Twiga chemical Ltd. This collaboration will be of good importance especially on the provision of subsidized ITNs, and coverage of ITNs sales outlets with stocked insecticides The planned national voucher system for pregnant women and under five children and continuation in utilizing partners

involve the private sector in the distribution of ITNs and the continuation of utilizing partner CBOs in the provision of ITNs.	CBOs in provision of ITNs will also enhance this effort
12. Mentoring of Community-based Organizations:	
Key to project sustainability is the identification and mentoring of strong C-IMCI focused CBOs. Currently the project has identified at least one CBO per targeted sub-county to continue C-IMCI initiatives after the project has moved on. It is recommended that the project attempt to identify and mentor a minimum of two CBOs per project sub-county to ensure access to services and resources throughout larger and more remote sub-counties.	Selection and strengthening of the CIMCI focused CBOs prepares for projects' formal pull out and becomes a base for sustainability. This strategy will be encouraged to start early so as to prepare and mentor the CBOs selected in each sub-county for CIMCI – II. CIMCI-plus will build capacity of FBOs and CBOs in respective target sub-counties. At least one CBO should be identified in each sub-county to avoid duplication and logistical constraints

AFRICARE/NTUNGAMO DISTRICT COMMUNITY-BASED INTEGRATED MANAGEMENT OF CHILDHOOD ILLNESS (CIMCI) PLUS PROJECT

PROJECT PERIOD: 1 OCTOBER 2003 – 30 SEPTEMBER 2008

SUBMITTED TO:

U.S. Agency for International Development
Bureau of Food and Humanitarian Assistance
Office of Private and Voluntary Cooperation
Washington, D.C.

BASELINE SURVEY REPORT

April 23, 2004

TABLE OF CONTENTS

I. EXCUTIVE SUMMARY

A. Background Information

The 304 mothers of the children aged less than 5 years were interviewed.

- The mothers were asked to indicate if they could read and write in their vernacular and 64% said they can read/write
- Majority (79%) were generally the primary school dropouts
- 89.1% said they were married, while the singles composed only 3.3%, divorced were 0.3%, separated 2.6% and widowed 4.6%.
- 84% said they had such economic activities that would give then personal income
- The activities that were mentioned were mainly selling of surplus agricultural products 82% and the handcraft, weaving and rugs 14%.
- It was found that 63% of the mothers interviewed did work away from home
- The mothers normally go with their children at places of work when they are working away from home (67.4%), other leave the children with their older siblings 23.7% while other with the relatives 16%.
- From the 304 households visited (total 475 children under five were covered), it was found that 51% of them had only one child less than five years, 41.8% had two children and the rest had 3 children

B. Breast Feeding and Nutrition of Index Children

- Among the children aged 0-5 months, they were all still breast feeding, while those age 6-11 months, majority (97.7%) were also still breast feeding. Interesting to note also is that the children aged 12-23 months, 70% were still breast-feeding
- 61% of the mothers interviewed said they breast fed their children with in the first one hour after delivery, while 27% said they took about 2-8 hours and 10% took more than 8 hours
- The most common foods eaten by children in 24 hours prior the survey were Bushera 51%, Milk/yogurt 46%, breast milk 37%, bananas 36%, and other mashed/soft food 30.5%.
- And 80% said their index children use different plates more so those who are still very young
- The young children tend to eat from separate plates as compared to those who are somewhat old **(X^2=15.788, DF =5, P =0.007)**. The intervention then needs to be properly guided taking care of the age of the child.
- 69% of mothers said add additional foods to child still breast feeding at 6 months, (13%) said the earlier than 6 months of age is good enough while 12% said after 6 months.

C. Diarrhea among the Children

- 18% of the index children had diarrhea two weeks prior the survey.
- Among the children who were still breast-feeding and had diarrhoea, 53.3% were breast-fed same as usual, 26.7% had reduction in the breast feeding trends. In general, 63.3% of children still breast feeding were either breast fed more or same
- 43% of children with diarrhea received the same amount of fluids during the time of sickness like before the sickness, while 38.9% said they had received more than usual. In general, 82% of the children with diarrhea had received more or same amount of fluids

- 26.2% of children with diarrhea received more of foods than before while 41% had got just as usual. In general terms, 67.2% of children with diarrhea had received more or same solid/mashed food during their sickness.
- The mothers said 65.4% of the children with diarrhea had received treatment from home while 34.6% had had it from outside home
- Those who got treatment at home, 74.5% had got herbal treatment, 25.5% got anti-diarrhea/antibiotics treatment, ORS was only taken by 7.8% of the same children
- Those taken away from home, 48.9% taken to government health facilities or clinics 34% nearest drug shops and to hospitals 4.3% and private physicians 6%.
- The kind of treatment that the children with diarrhea got from outside home was mainly anti-diarrhea drugs or antibiotics, 48% and ORS 34%
- Only 4.9% of the interviewed mothers could describe the preparation of ORS correctly
- The most common way of getting diarrhea as perceived and mentioned by mothers were eating with unwashed hands 26%, eating cold food 26%, lack of latrine 18%, worms 19%.
- The most common times mentioned of when they wash hands were after latrine use 61.5%, when hands are dirty 85.2%, and before eating 49%.
- The majority of the homes of the mothers surveyed never had hand washing facility with soap present near the latrine (96%)
- Common symptom that mothers normally look for in order to take their children with diarrhea to the health facility to seek treatment were mainly weakness or tiredness of children 53%, prolonged diarrhea 31%, dehydration 23% and to some extent fever 19% and vomiting 17%.
- In last 12 months prior the survey, 41.2% of index children had been taken for false tooth extraction.
- Majority of these children get the false tooth extraction when they are still very young i.e. less than 2 months 56.5% or just before 6 months of age 31.2%.
- The practice of false tooth extraction was found to be very much influenced by the education of the mother 30% (Gamma =0.26). Actually a child whose mother could not read and write had almost double the risk of having false tooth extraction than a child whose mother could read and write (**Odds ratio =1.7**).

D. Immunization Levels among those aged less than 24 months

- 58.3% of the children of interest had mothers who possessed their vaccination records.
- 73.4% said the given child received the BCG
- 75.9% had the scar present and 24.1% the scar was absent.
- OPV0, on the cards, out of 120 children, 84 children never had the date indicated (70%)
- The coverage of DPT at the three levels was well indicated for example the DPT1 only 8 children (7%) had no indication of date for this, 17 children 14% never indicated for DPT2, while 29 children 24% had no indication of DPT3 on their cards
- 45% that had the vaccination records had no date indicated as to when the child took the measles vaccine
- 76.7% had tetanus injection as compared to those who have not yet 23.3%
- Only 20% were given at birth the polio drops while 76% was after wards and 4% could not recall
- These were 36 in number that responded to the m**easles vaccine**, 75% said they have been immunized against measles. Among those aged 9-11 years, no one was vaccinated as yet.
- Among the 12-23 months old children, 99% of them had participated in the national immunization days, while among 6-11 months only 51% had participated, and yet another smaller proportion of 23% among the children aged 0-5 months had participated.

- 66% of mothers said they got injection during pregnancy to prevent the child from getting convulsions after birth, an anti-tetanus shot or an injection at the top of the shoulder.

E. Fever

- The prevalence rate of fever among the children aged 0-59 months was standing at 29.3%,
- 68% of children with fever that were still breast-feeding were either breast-fed more or same during the time they had fever.
- 47.2% and 31.2% of children with fever were able to drink more than usual and same as usual respectively. In general, those who were able to drink as usual or more than usual were 78.4%
- 67.7% of children with fever ate more or same as usual during fever
- Out of 122 children that had fever, 51.6% had received treatment at home before going out to other places to seek treatment
- Home treatment was dominated by panadol/maxadol 72.6% and Chloroquine /qawaquine /malaraquine 54.8%. The proportion that received fansidar at home was only 11.3%.
- About 85% said they went outside home and sought treatment for their children.
- Those taken away from home went to drug shops 37%, or government health facility/clinic 32% and private physicians 14.5%.
- Outside home treatment ranged from Panadol/maxadol 65.5%, chloroquine /dawaquine/malaraquine 45.5%, Quinine36.4% and Fansidar 20.9%
- Mothers said mosquito bites 84.8% , and drinking un boiled water 15% can cause malaria
- As a way of avoiding the malaria, suggestions given were clearing compound 28%, eliminating stagnant water 23%, using mosquito nets 21%, closing windows and doors early 24% and boiling drinking water 18%. However, 22.5% said there is nothing they can do to prevent malaria.
- 16% of 304 households visited during the survey used at least a bed net the previous night prior survey
- 88% said children under five, mothers 54%, husband 44% used the bed net
- Only 23 out of 64 (34%) had dipped the nets for children, of whom 26% had done it one month prior the survey
- From the data, 65% of the observed nets were in good state and were somewhat effective in protecting the children from mosquito bites
- 12% of the index children were taken for 'millet' extraction in 12 months prior the survey
- How pregnant mothers can be protected against malaria mentioned were; use of itns 49%, taking anti-malarial 37%, closing windows and doors early 19%
- About 50% of the mothers confessed that they never took the drugs during last pregnancy
- Common drug taken by the pregnant mothers was fansidar 82% and only 11% said they took chloroquine
- Anti malarial drugs were obtained from Health center III 51.3%, health center IV 14%, private clinics 11.3% and only 9% went to hospital
- Majority of the mothers said they got the drugs twice 65%, while 17% got the drugs only once and 14% got them thrice
- The majority mentioned that took the drugs at 4^{th} month 64.4%, and 7^{th} month 32.9%.
- The visiting of the antenatal care services was very high among the mothers 93%

F. HIV/AIDS

- 100% of mothers have ever heard of AIDS
- Main signs that mothers look up to are loss of weight 68%, skin rash 47%, persistent fever 16%, diarrhea 16% and cough 30%.
- 93.3% think some one can avoid AIDS, while 3% said it is not possible to avoid it and 3.7% said they do not know
- Suggestions of avoiding AIDS were abstaining from sex 84%, use of condom 54% and limiting sex to one partner 31%
- During pregnancy, 67% of the interviewed mothers said the child can get the virus from the mother
- At the delivery point, 83% of the interviewed mothers said it is possible for the child to get AIDS from the mother
- During breast feeding, those who said they did not know were 20%, 23.8% said no, while just 56% said the child can get the virus during breast feeding
- Only 6% said have ever tested for the HIV/AIDS.
- Majority of the mothers said they can look after HIV/AIDS patients very well 89.4% and only 10.2% said they can not
- 55.1% said sick teachers should not be allowed to teach their children
- Their children playing with other children who have HIV/AIDS, most of the mothers said no to that 56.4%.

G. Care Seeking

- 82.8% of mothers do consult at household level about the health of there children,
- About 86% said they do consult other people other than the members of the household about the health of the children while 13.8% do not
- The people consulted are neighbors 59%, mother in-laws 37.3%, medical doctors 22%, community health workers 26%, TBA 23%
- Cases where a child should be taken immediately when sick are fever 71%, child becoming sicker 38%, when not able to breast feed or drink 20%
- 92.3% had ever taken their children to health facility
- Most of the mothers waited up to 1 day 36%, though others just took the child straight away 18.9% and others waited up to two days 26.8% from time they new the child was sick up to the time the child was taken.
- The decision to take the sick child to health unit was made mainly by either the mother 47% or the father 43%
- Most mothers 90.4% mainly took the sick children to health unit
- 42.9% of the mothers said they were asked to take back children, and 75% were actually taken back, the rest 24.4% just stayed home
- Out of 5 mothers referred to the hospital with their children, 3 managed to go there (60%) while the other two failed to go there, reason being additional costs being an affordable
- Main deterrent from using the health facilities, was financial costs involved 64.9%.
- 61.7% were move a distance of less than 5 kms, while 30.4% move 5-10 kms and the rest 7.9% move for more than 10 kms
- 72.7% said these health workers have never visited the communities while 27% said they do visit sometimes while only 0.3% said they always visit

Annex 3-KPC Report

II. ACKNOWLEDGEMENTS

We first of all thank the 304 mothers for their commitment and sacrifice of their time to attend to the enumerators, and give the responses that have been analyzed and presented in this report.

We also acknowledge the Ntungamo District Administration for giving permission to staff that participated in the survey and giving us a vehicle that helped us a lot during the survey.
Africare/Ntungamo express sincere thanks to:

Kendra Blackett of Africare Washington for the technical support during the designing, editing and re-focusing of the questionnaire.

Dr Abdalla Meftuh-the Africare Uganda Country representative, Ms Laurence Mukanyindo for all the administrative and technical assistance rendered like questionnaire designing and printing.

Thanks to the Program Manager Africare Kabale for giving us a vehicle that facilitated the process.

DDHs for honoring the function and closed it

Mr Ndyanabo James(TB& Leprosy focal person) and Mr Twesigye Francis (DHE) for the good job done as supervisors

Also appreciated are the 14 Enumerators that participated in administering the questionnaire as they worked very hard and showed a lot of cooperation.

Warmest appreciation to Mr Jimrex Byamugisha for editorial work, determining the sample sizes, data entry and analysis. Thanks for the highest level of commitment in producing the report.

Heart felt appreciation go to Sam and Prisca, Africare/Ntungamo Accountant/Admin Assistant & Logistics Officer respectively for making all the necessary arrangements for the survey. Africare Drivers, Kakuru, Agaba, Kayuwa and Warren did an exemplary work and we say thank you all.

III. INTRODUCTION

With funding from United States Agency for International Development(USAID) Africare implemented a four years(Oct 1999-Sept 2003) Community based Integrated Management of childhood Illnesses (CIMCI) project in the eight Sub-counties of Ntungamo District. After successful implementation, the project was extended to cover the seven Sub-counties that had not been covered which include; Nyakyera, Ruhaama, Rugarama, Ihunga, Kayonza, Itojo and Bwongyera..

As one of USAID funding requirements, Child Survival projects must conduct the Baseline Survey before the implementation to use it as a bench mark upon which to measure performance.
It is against this background that the survey was conducted between January20-25, 2004 to inform the project of where the Sub-counties were in terms of Knowledge, Practice and coverage(KPC) of the behaviors related to child and maternal health and to enable the project develop the appropriate interventions and messages to address the problems in the communities.

A. Goal of CIMCI plus

By the end of 2008, Africare and MOH will have reduced morbidity and mortality of children under five and have improved the health status of women of reproductive age in the 15 sub-counties of Ntungamo District of Uganda.

B. General Objectives

1. To promote the knowledge and behaviors elated to the prevention of childhood illnesses, at the house hold and Community levels.
2. To improve the home management of the sick child by promoting timely and appropriate care seeking at the household and community levels.
3. To improve the accessibility of the under five children and Women of reproductive age to quality health services and products both at the facility and community levels.
4. To strengthen the national and the district MOH capacity to replicate and sustain the community IMCI approach.

IV. BASELINE SURVEY METHODOLOGY AND PLANNING

A. KPC Questionnaire Development

The Monitoring and Evaluation officer Started on the questionnaire development in Mid December 2003. The Focus was on the five intervention areas which included; Malaria (35% effort), Immunisation (25% effort), HIV/AIDS (15% effort), Nutrition, Micro nutrients and breast feeding (15% effort) and CDD (10% effort). In the development of the questionnaire, the five intervention areas were addressed as well as Care seeking section. The additional questions on to the CIMCI phase 1 Final Evaluation Questionnaire were derived from;

Annex 3-KPC Report

a). KPC 2000+(www.childsurvival.com/kpc2000/kpc2000.cfm)
b) 2001-2005 Government of Uganda-UNICEF Country Programme-Household and Community- Based Practices Survey Questionnaire
c) Uganda Malaria Partnership Program (UMPP) 2003-2006 -Baseline Survey on the performance of Behaviour Change Communication Intervention on Malaria Prevention and Treatment.

B. Sections of the Questionnaire and Changes/Modifications Made

As already mentioned, the CIMCI plus questionnaire was a modification of the Phase 1 Final Evaluation. The following were the modifications done.

SECTION	MODIFICATION	COMMENTS.
Cover Page	1-Provision of where the KPC Manager had to sign and approve .	The Supervisors had to make sure that they did a thorough check of the questionnaires before submission to the KPC Manager. Double-checking minimized mistakes.
Background Information(Qn1 -9)	1-A question on the marital status of the Mothers was added.	The type of the family can influence sometimes-childcare practices e.g single mother, widowed, divorced etc.
Breast feeding and Nutrition(Qn 10-18)	1-Qn 15 response1&2 were specified for above 18 years other than the maid &below 18yearsrespectively. 2-Qn 17-addition of response 4 -above six months.	Wanted to specify the adult since the maid could also be an adult. Wanted to cater for that response since in questionnaire pre-testing mothers mentioned it a lot.
Diarrheal Diseases (Qn19-34)	1-Qn27 was revised to read.....and you would like to prepare ORS solution for him/her, what steps would you follow? 2-Qn 28 was revised to B How does one get Diarrhea? 3-added response 3 –Don't know 4.Since July...was removed on Qn33	During the final Evaluation, it was observed that mothers did not understand the two question and others gave the response of don=t know but was not provided for. -since July...was deleted because the Question was intended to get data on the practice.
Immunization (qn35-45)	1-This was a new section that was added. ARI section was removed.. 2-The questions were revised e.g BCG scar-inspect the right shoulder DPT-left thigh and not buttocks Measles-left thigh not arm	-This was in relation to the local practice on the immunization sites. -Questions were got from Rapid KPC Module 4A

SECTION	MODIFICATION	COMMENTS.
Fever(Qn46-74)	1- Qns on millet extraction were added. 2-Qn s 69-74 were added to capture IPT and Antenatal 3. Qn73 Antenatal replaced Prenatal. 4. Qn74. Responses7-10 were deleted	1-Done to address the issues of cross cutting signs and symptoms of ARI&Fever. 2-New interventions in the CIMCI plus 3-Corrected 4-Were not relevant
HIV/AIDS(Qn 75-88)	1- Qns 80-88 on VCT, Stigma and discrimination were added	This was as proposed. Questions were extracted from rapid KPC module 7

NB. The questionnaire was reviewed with technical guidance from the Health Program manager- Africare Washington, the Statistician, and the Program Co-ordinator.

C. Sampling method for the Survey clusters

The WHO /EPI 30 cluster sampling method was used. The population and the number of Households were obtained from the 2002 Uganda population and Housing Census. 300 mothers with children under five years were interviewed. Two index children were considered i.e youngest and oldest child.

D. Training of Enumerators

The training took place from Jan20-22, 2004 at ROSEMA Hotel in Rubaare Sub-county. The objective of the training was to help the enumerators conceptualise the questionnaire and get basic interviewing skills as well as their roles and responsibilities in the survey. A total of 14 Enumerators (most of whom had participated in two or three of the Ntungamo CIMCI surveys and from Health Department) and 2 supervisors were trained(a copy attached). The training were facilitated by the Program Co-ordinator, M&E Officer, BCCS and the two Supervisors. The PC summarised the need for the Baseline survey as a need to know:
a) Where are we?
b) Where do we want to go?
c) How do we reach there?
The detailed training program is attached.

The Deputy DDHS who urged enumerators to get a proper and sincere baseline from where to judge the District closed the training. He remarked thus: *A this activity should not be looked at as an Africare business. It is only complementing the Districts efforts and helping you Health workers to realize the District Health sector objectives in preventive health"*

E. Data Collection

Data collection took three days from January 22-25, 2004. During the three days of fieldwork, Enumerators used the KPC questionnaire to collect quantitative data in the CIMCI Plus seven Sub-counties Four vehicles were used i.e 3 Africare Double cabin Pick ups and 1 Land rover from the District. The team was divided into two groups each with two vehicles and one supervisor. The two groups further divided themselves into two sub-groups containing 3 or4 enumerators to cover different clusters within the Sub-county. Each enumerator administered seven questionnaires on average daily. Each supervisor ensured that he visited each enumerator once a day to ensure that he/she was on track. The M&E provided the overall support supervision to both groups.

F. Quality Control

The following were put in place for quality control:

1) The project identified **a statistician** who had participated in the CIMCI phase1 Midterm and final Evaluation Surveys. The Health Program Manager Africare-Washington, the PC, the M&E, the Statistician participated in the development and cleaning of the Questionnaire. This enabled him to get more insights of the whole Survey before Data entry and analysis was done.

2) **Training and fieldwork were residential**.
This gave more time to enumerators to pass through the questionnaire several times. Role-plays in the late evenings were done and this enabled them gain more experience and confidence in administering the questionnaire. Besides, it also gave supervisors and the M&E ample time to review the questionnaires after fieldwork.

3) **Translation and piloting the questionnaire**.
Questions that were written in English were translated in Runyankore with every enumerator participating during the training. The questionnaire was piloted outside the 30 clusters. The Enumerators were paired and one interviewed while the other looked and made comments and vice versa .The objective of pairing them was to know each and every ones weaker areas and try to correct them before the field work. After the pilot, there was sharing of field experiences and correction or re- interpretation of questions.

G. Data management and Analysis

This section explains the methodology applied from the time the questionnaires were from field up to report writing.

G.1. Data coding

Four research assistants who were oriented through questionnaire and given ideas on what was expected, coded the filled questionnaires. The same four people under a close supervision of the consultant did the work. They did the work from a common place to ease the making of accurate code sheet. At this stage, some data collection errors were identified and corrected while others were marked not for entry into the computer.

G.2. Data entry

A data entry screen was customarily made in EPINFO by the consultant who also made its customized check program. These two aspects helped minimise the data entry errors. The work of data entry was done by five data entrants who also had to do it from a common place under close supervision of the consultant.

G.3. Data cleaning

Each data entrant cleaned the records he/she entered using the machine, and after merging of the datasets, the consultant did final cleaning before doing data analysis. Logical issues as well as consistency of the data were among key issues investigated at this stage. This was done in EPINFO.

G.4. Data analysis

The cleaned database was then exported to SPSS/PC+ for data analysis. The analysis was done following the analysis framework that the consultant made and submitted to the client. The analysis was done at two levels, namely the descriptive and policy focused. The chapter of the findings shows the tables and charts that summarize the data in descriptive manner (showing frequency distributions in percentages and numbers, and averages, minimum, maximum and mode) and also statistical tests that have been explained for easy following. Some of the data was transferred to MS Excel to help draw some charts as seen in the report. The results are not weighted since population of farmers was not available.

G.5. Report writing and presentation

The consultant was able to use a mix of software in writing the report including the MS-Word and Ms-Excel. The report has two sections i.e. the executive summary and the findings. The chapter on findings is presented as per major sections as indicated in the questionnaire.

The report has been presented to the client both as a hard copy and soft copy. Included in a packet submitted to the client is the dataset both EPINFO version, and SPSS Version. The data dictionary is included in the SPSS version dataset. The data capture screen and the check program are also submitted in the softcopy form.

H. Constraint during the survey

The major constraint was failure to find mothers at home since it was millet-harvesting season. This made the groups finish clusters late in the night because they utilized evening times to reach most mothers. The opportunity of holding the survey on Sunday was also utilized as most mothers were drying the millet and did not go to Churches.

V. BASELINE SURVEY FINDINGS

A. Introduction

The findings of this study have been grouped into the following major sections:

Back ground information which describes the mothers interviewed, and the some characteristics of the households composition like the number of children present who are under five years.

This is followed by the section on breast feeding and nutrition of children covering both knowledge and practice components.

A section on Diarrheal diseases, which covers prevalence, practices and knowledge, is followed by a section on immunization which in turn if followed by a section on Fever and then another on HIV/AIDS.
Other section in the report is on care seeking practices.

B. Background Information on Mothers of The Children Aged 0-60 Months

B.1. Age of the mothers

The mothers of the children aged less than 5 years that were interviewed in total they were 304, and only one never indicated her age. Those who indicated were mainly aged 25 to 34 years as shown in the table 1.1 below.

Table 1.1 Age distribution of the mothers interviewed

Age of mothers	No	%
<=24 years	98	32.2
25-34 years	147	48.4
35-44 years	52	17.1
45+ years	6	2.0
Total	**303**	

The youngest of them was aged 18 years, and the oldest was 55 years with the average age of 28 years.

B.2. Ability of mothers to read and write in vernacular.

The mothers were asked to indicate if they could read and write in their vernacular and 64% said they can read/write. The 35.9% who said they can't read/write are not a small proportion, and so in planning communication strategies, they can not be ignored. The ability to read and write was not influenced by the age of the mother, since those who

could read were 28.2 years as well as those who could not read were 28.5 years on average.

Table 1.2. Ability to read/write in vernacular

Read/write status	No	%
Can read/write	195	64.1
Can read/write	109	35.9
Total	**304**	**100.0**

Those who said they could read/write, were mainly upper primary dropouts i.e p5-p7, 54.6 % and generally the primary dropouts composed 79.1%. The details are well indicated in the table 2.3 below.

Table 1.3 Level of education of mothers

Level of education	No	%
P1-P4	48	24.5
P5-P7	107	54.6
S1-S4	31	15.8
S5-S6	4	2.0
Tertiary	6	3.1
Total	**196**	**100.0**

B.3 Marital status of the mothers

Mothers were asked to indicate their the then marital status, and 89.1% said they were married, while the singles composed only 3.3%, divorced were 0.3%, separated 2.6% and widowed 4.6%. The marital status is very important because it directs a number of issues the affects the life style of the home.

B.4 Economic activities of mother

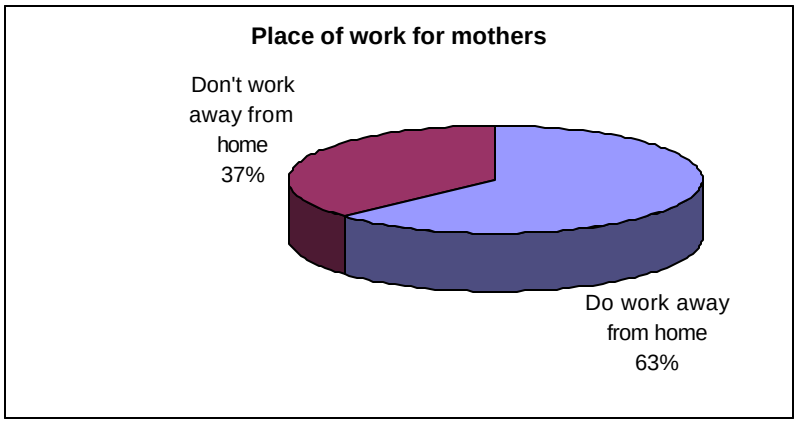
Mothers were again asked to indicate if they were having any income generating activities they were involved in that could generate money for their own personal use. The majority of the mothers (about 8 in every ten) 84% said they had such activities. The activities that were mentioned were mainly selling of surplus agricultural products 82% and the handcraft, weaving and rugs 14%. The other activities mentioned were growing crops specifically for sale 7.4% and shop operations 6.6%. The rest were doing other businesses.

Table 1.4 Economic activities done by mothers

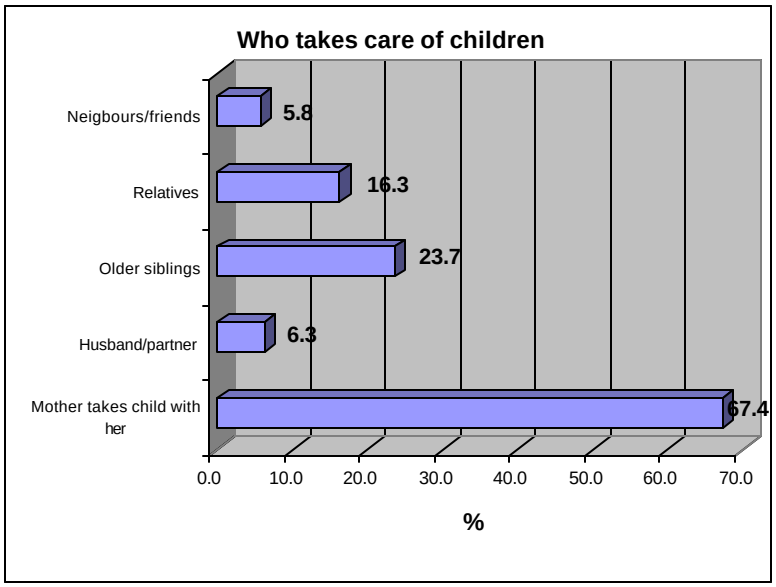
Economic activities done by mothers	No	%
Handcraft, weaving, rugs	36	14.1
Growing crops for sale	19	7.4
Selling surplus agricultural products	210	82.0
Shopkeeper	17	6.6
Street vendor	4	1.6
Salaried work	6	2.3
Animal keeping	7	2.7
Others	24	9.4
Total	**256**	

B.5 Care for children while the mother is away for work

The other aspect that was investigated about the mothers was whether they go away from home to work or not and if yes, who then takes care of the children. It was found that 63% of the mothers interviewed did work away from home. This is a good proportion and while away, they said some people take care of the children.



The mothers disclosed that they normally go with their children at places of work when they are working away from home (67.4%). However, some mothers leave the children with their older siblings 23.7% while other with the relatives 16%. A very small proportion of the mothers leave the children with their spouses 6.3%.



C. Background information about the children under five years of age.

The sampled households were asked to indicate the total number of children in their households that were under 5 years and give the details of their names sex and age.

From the 304 households visited, it was found that 51% of them had only one child less than five years, 41.8% had two children and the rest had 3 children so there were about two children in a given household on average.

A total of 475 children aged below 5 years were found in the 304 households of whom 49.7% were males and 50.3 were females.

Looking at their age distributions, the ages were categorized as those below 1 year 22%, 1 to 2 years were 21.9%, below 3 years they were 18%, and those below 4 years they were 20% while those of 4 to 5 years they were 17.5%.

The distribution of the index children by age and sex is shown in the table 4 below, and shows that most of them are aged 12-23 months and 36-47 months. The male/female distribution was almost uniform as shown.

Table 1.5 Distribution of the index children by age and sex

	Sex of index child		Total
Index child age category	Male %	Female %	
0-5 months	12.1	15.0	13.5
6-11 months	11.6	7.9	9.8
12-23 months	21.4	23.3	22.4
24-35 months	14.7	17.2	16.0
36-47 months	21.4	19.4	20.4
48+ months	18.8	17.2	18.0
Total	**224**	**227**	**451**

C.1. Breast Feeding and Nutrition of Index Children

As a methodological fact, the index children in the household whose information was captured were the youngest and the oldest children in that household. This meant that in the 304 households surveyed, details were got from 451 children under five.

C.1.1. Age at which mothers stopped breast feeding the index child

Table 2.1 The age in months of child when mothers stopped breast feeding index child

	At what age stopped breast feeding					Total
	Still	0-6 months	7-12 months	12-23 months	24+ months	
0-5 months	100.0	0.0	0.0	0.0	0.0	61
6-11 months	97.7	0.0	2.3	0.0	0.0	44
12-23 months	70.3	1.0	5.0	22.8	1.0	101
24-35 months	9.9	0.0	2.8	52.1	35.2	71
36-47 months	1.1	0.0	8.8	44.0	46.2	91
48+ months	0.0	1.2	7.4	43.2	48.1	81
	40.8	0.4	4.9	30.1	23.8	449

Among the children aged 0-5 months, they were all still breast feeding, while those age 6-11 years, majority (97.7%) were also still breast feeding. Interesting to note also is that the children aged 12-23 months, 70% were still breast-feeding.

Apart from those who were breast-feeding, 30% said they stopped breast feeding at an age of 12-23 months, and 23.8% breast fed when they were older than 24 months.

C.1.2. Time taken to breast feed the child after delivery

61% of the mothers interviewed said they breast fed their children with in the first one hour after delivery, while 27% said they took about 2-8 hours and 10% took more than 8 hours. The trend did not change with the age of the child.

Table 2.2 Time the mother breast fed the child after delivery

	Time taken to breast feed a child after delivery				
	Within one hour	2-8 hours	8+ hours	Not remember	Total
0-5 months	59.0	27.9	13.1	0.0	61
6-11 months	75.0	18.2	4.5	2.3	44
12-23 months	62.4	22.8	11.9	3.0	101
24-35 months	64.8	28.2	5.6	1.4	71
36-47 months	53.3	34.8	9.8	2.2	92
48+ months	59.3	27.2	12.3	1.2	81
Overall	61.1	27.1	10.0	1.8	450

C.2. Eating habits of children

C.2.1. Types of food eaten in the last 24 hours prior the survey

The mothers were required to make a 24 hour recall of what the index children ate, and this is summarized in the table below. The most common foods eaten by children in 24 hours prior the survey were Bushera 51%, Milk/yogurt 46%, breast milk 37%, bananas 36%, and other mashed/soft food 30.5%. Other foods eaten as indicated in the table are leafy green vegetables 21.3%, carrots/mangos/pawpaws 10%, and potatoes 7%. Only a small proportion of children ate eggs 3%, meat/fish 4% as compared to those that ate beans/peas 76%.

Table 2.3 Type of food the index child ate 24 hours prior the survey

Category label	Freq	%
Water	75	16.8
milk/yogurt	203	45.5
Powdered	6	1.3
mashed/soft food	136	30.5
fruit or juice	31	7
Bushera	228	51.1
carrots, mangos or pawpaw	45	10.1
grains foods	158	35.4
leafy green vegetables	95	21.3

Category label	Freq	%
meat/fish	18	4
Peas/beans	339	76
Eggs	14	3.1
honey/sugar	5	1.1
fat/oils/eshabwe	27	6.1
breast milk	166	37.2
Bananas	159	35.7
Rice	3	0.7
Potatoes	33	7.4
Cassava	2	0.4
Posho	1	0.2
Others	10	2.2
Total	**446**	

C.3. Eating from separate plate

Mothers were also asked to indicate if the children were using a separate plate to have their meals from the rest of the members of household. And 80% said their index children use different plates more so those who are still very young.

Table 2.4 Use of separate plates by index child

	Use a separate plate		Total
Age of child	Yes	No	
0-5 months	100.0	0.0	3
6-11 months	71.0	29.0	31
12-23 months	91.1	8.9	101
24-35 months	83.1	16.9	71
36-47 months	77.2	22.8	92
48+ months	70.4	29.6	81
Total	**80.2**	**19.8**	**379**

The association that takes place between the eating from a separate plate and age of the child was significant **(X^2=15.788, DF =5, P =0.007).** The young children tend to eat from separate plates as compared to those who are somewhat old. The intervention then needs to be properly guided taking care of the age of the child.

For the children that share plates with others, the mothers were asked to indicate whom the children share with. The majority of the children shared with older people i.e adults though 35.5% said they share with other children.

Table 2.5 The people that index child shares with the plate while eating

	Whom child shares with the plate			Total
	Other children	Adults	Others	
6-11 months	0.0	100.0	0.0	9
12-23 months	44.4	55.6	0.0	9
24-35 months	38.5	53.8	7.7	13
36-47 months	47.6	52.4	0.0	21
48+ months	33.3	66.7	0.0	24
Total	**35.5**	**63.2**	**1.3**	**76**

C.4. Who serves the children

Adult members of the household (86.6%) mainly served the children under study (index children), while their mothers strictly served 12%. This is well demonstrated in the table below. It should be noted that some respondents never answered this question.

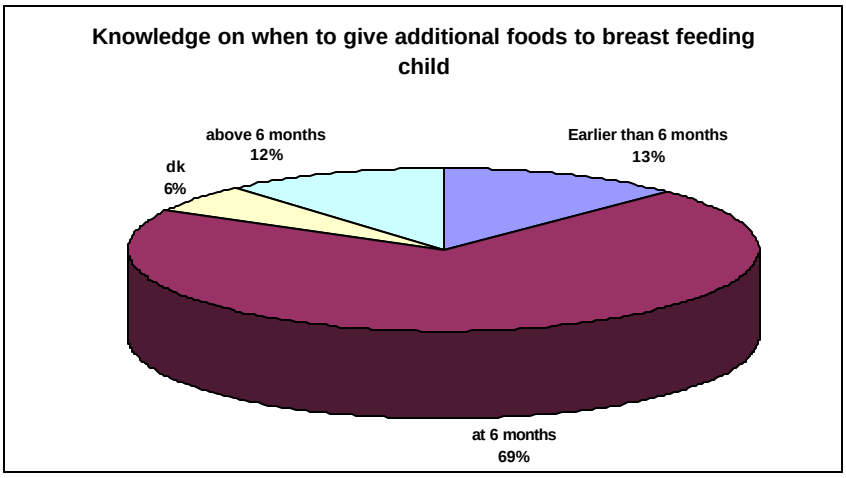
Table 2.6 The person that serves the index child food in a home

	Who serves the child				Total
	Adults	Other children	Mother	Others	
0-5 months	100.0	0.0	0.0	0.0	4
6-11 months	90.6	0.0	9.4	0.0	32
12-23 months	84.0	1.0	14.0	1.0	100
24-35 months	84.5	2.8	12.7	0.0	71
36-47 months	83.0	1.1	15.9	0.0	88
48+ months	93.5	0.0	5.2	1.3	77
Overall	86.6	1.1	11.8	0.5	372

D. Knowledge of improving nourishment of children

D.1. Knowledge of mothers about when to introduce additional foods to a breast feeding child

As a way of testing the knowledge of when a child still breast feeding should have additional foods given, 69% said at 6 months. However about 1 in every ten (13%) said the earlier than 6 months of age is good enough while 12% said after 6 months. 6% were very open and they said they do not know.



E. Diarrhea Among the Children

E.1. Prevalence of diarrhea among the index children

Mothers were asked whether their index children had diarrhea in the last two weeks prior the survey, and generally 18% of the index children had it in the specified time period. The prevalence associated with the age of the index child **(X^2= 55.07, DF =5, P= 0.000),** for example, among the children aged 6-11 months it was as high as 48%, while among the 36 months and above aged children it was very low. This may require that the sensitization of the communities may need to advise the mothers in relation to the age of the child and make them less vulnerable.

Table 3.1 Prevalence of diarrhea

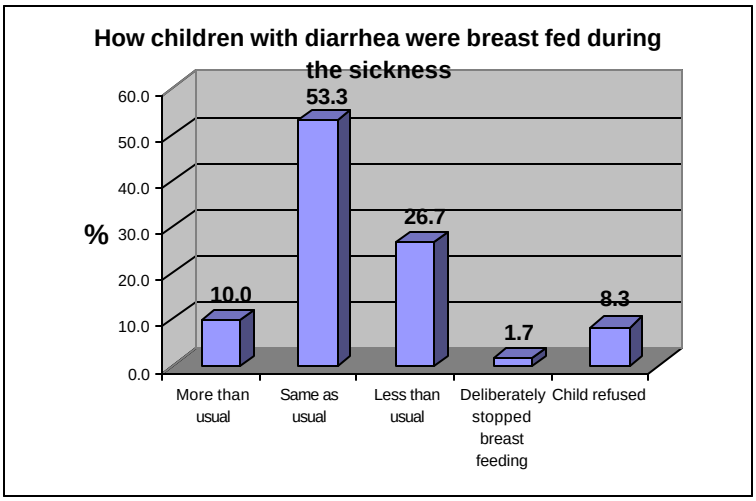
	Had diarrhea		Total
	yes	no	
0-5 months	23.0	77.0	61
6-11 months	47.7	52.3	44
12-23 months	27.7	72.3	101
24-35 months	14.1	85.9	71
36-47 months	2.3	97.7	88
48+ months	7.4	92.6	81
Overall	18.2	81.8	446

E.2. Feeding habits of children with diarrhea

This section looked at the children still breast feeding, those who had started eating and drinking. The analysis is therefore focused on the three areas, the breasting experience, the eating of solid/smashed food and drinking.

E.2.1 Breasting feeding practices of children with diarrhea

Among the children who were still breast-feeding and had diarrhea, were mainly breast-fed same as usual 53.3%. Those children that were indicated as having had a reduction in the breast feeding trends were 26.7%. In general, 63.3% of children still breast feeding were either breast fed more or same, while the rest had a reduction or complete stop which was either by the mother stopping or the child refusing.



E.2.2. Giving of fluids

Well knowing of the effect of the diarrhea, the study wanted also to establish the practice of mothers in giving of fluids to children who had it. In general terms, 43% were said to have received the same amount of fluids during the time of sickness like before the sickness, while 38.9% said they had received more than usual.

Those who received less than usual were only 18%. In general terms, 82% of the children with diarrhea had received more or same amount of fluids.

Table 3.2 Provision of fluids to an index child with diarrhea

	Provision of fluids			Total
	More than usual	Same as usual	Less than usual	
0-5 months	0.0	83.3	16.7	6
6-11 months	38.1	47.6	14.3	21
12-23 months	28.6	50.0	21.4	28
24-35 months	60.0	10.0	30.0	10
36-47 months	50.0	50.0	0.0	2

	Provision of fluids			Total
	More than usual	Same as usual	Less than usual	
48+ months	100.0	0.0	0.0	5
Overall	38.9	43.1	18.1	72

E.2.3. Giving of solid/mashed foods

Notice that the base of the children that had diarrhea is changing for the different tables, and this is because some children had not started taking either fluids and or foods because of age.

However, of those that had diarrhea and were already taking some foods, 26.2% were said to have received more of such foods than before while 41% had got just as usual. In general terms, one can say that 67.2% of children with diarrhea had received more or same solid/mashed food during their sickness.

Table 3.3 Provision of solid/smashed foods to an index child with diarrhea

	Provision of solid/smashed foods			Total
	More than usual	Same as usual	Less than usual	Total
0-5 months	0.0	100.0	0.0	1
6-11 months	13.3	40.0	46.7	15
12-23 months	14.3	50.0	35.7	28
24-35 months	50.0	20.0	30.0	10
36-47 months	50.0	50.0	0.0	2
48+ months	80.0	20.0	0.0	5
Overall	26.2	41.0	32.8	61

E.3. Treatment of children with diarrhea

The mothers were asked to indicate where they got the treatment for their children, and the kind of treatment they got either from home or health unit.

E.3.1. Place of treatment

The mothers said 65.4% of the children with diarrhea had received treatment from home while 34.6% had had it from outside home.

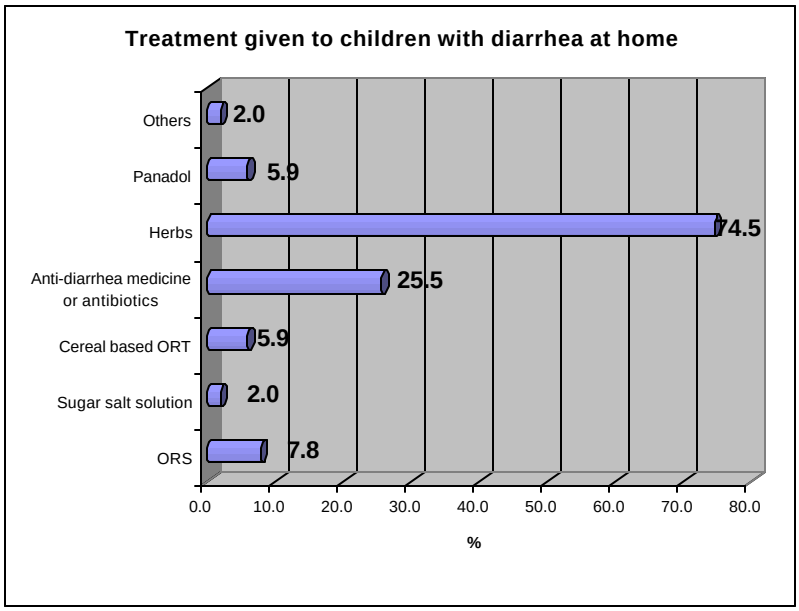
This place of treatment did not significantly be associated with the age of the child.

Table 3.4 Where the index child with diarrhea got treatment

	Where got treatment		
	At home	Outside home	Total
0-5 months	83.3	16.7	12
6-11 months	52.4	47.6	21
12-23 months	60.7	39.3	28
24-35 months	80.0	20.0	10
36-47 months	50.0	50.0	2
48+ months	80.0	20.0	5
Overall	65.4	34.6	78

E.3.2. Treatment at home

The nature of treatment was very import aspect for the children that had diarrhea, which they got at home. The interesting bit of this is that of the 51 children with diarrhea who received treatment from, 74.5% had got herbal treatment. And 25.5% got anti-diarrhea/antibiotics treatment. ORS was only taken by 7.8% of the children of interest.

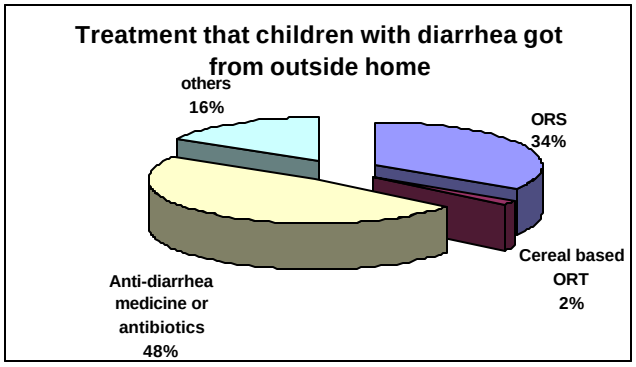


The children who were taken from home, they were mainly taken to government health facilities or clinics 48.9%. Others were taken to the nearest drug shops 34% while those taken to hospitals were just a small proportion 4.3%. The private physicians were only visited by 6% of the sick children with diarrhea.

Table 3.4 Where else the child with diarrhea was taken for treatment other than home

Where child was taken	No	%
Government hospital	2	4.3
Government health facility clinic	23	48.9
Private physician	3	6.4
Drug shop	16	34.0
Relative, friend or elder	1	2.1
Others	2	4.3
Total	**47**	**100.0**

The kind of treatment that the children with diarrhea got when taken outside the home was mainly anti-diarrhea drugs or antibiotics, 48% and ORS 34%. This is well indicated in the figure below.



The data indicated that the place where the child is taken has great influence over what the child is given in the long run (**X^2=46, DF =12, P =0.000**). This is explained in the table below

Table 3.5 The nature of treatment given outside home

	Treatment outside home				Total
	ORS	Cereal based ORT	Anti-diarrhea medicine or antibiotics	Others	
Government hospital	50.0	50.0	0.0	0.0	2
Government health facility clinic	60.9	0.0	39.1	0.0	23
Private physician	33.3	0.0	0.0	66.7	3
Drug shop	31.3	0.0	62.5	6.3	16
Relative, friend or elder	0.0	0.0	100.0	0.0	1
Overall	46.7	2.2	44.4	6.7	45

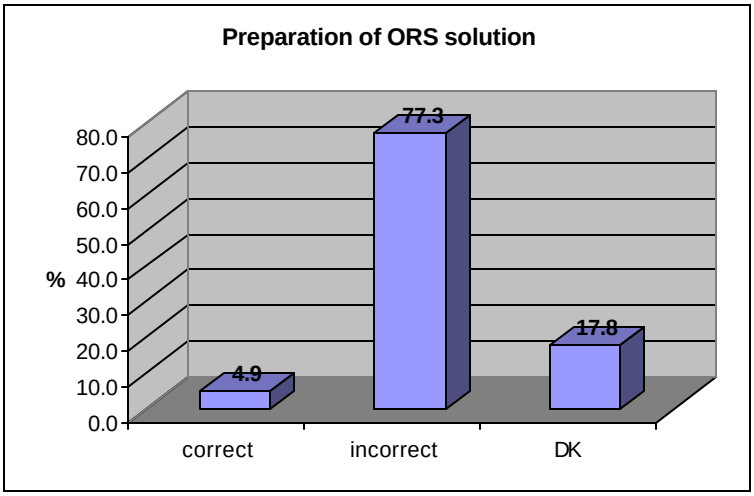
Looking at the information in the table above, children take to hospitals are given ORS, and the same thing happens with those taken to government health facility/clinic. Taking the private physician as an example, majority of the children is given anti-biotic.

This may imply that the project needs to advise the mothers where to go in case the child gets diarrhea since this affects what children are given.

F. Knowledge about diarrhea case management

F.1. Preparation of ORS

One of the areas of managing diarrhea cases is the preparation and administration of ORS. Mothers were asked to describe the steps taken to prepare the ORS for child with diarrhea, and those who said they all steps correctly were only 15 out of 304 mothers interviewed. This made only 4.9% of the entire sample size, which is a rather very small proportion. The ones considered not knowing were those who tried and failed and those who could not try any single step by saying they just do not know. This is well demonstrated in the chart.



As noted from the results, it is obvious that this is general ignorance which is not influenced by whether the mother is educated or not, young or old, rich or poor. It should be tackled massively knowing that mothers just fall in the same trap. The major issue that brought this most likely was the washing of hands as something major.

F.1.1. Knowledge on how diarrhea spreads and how to avoid it

Mothers were also asked about how one can get diarrhea, and they gave a number of varying responses as shown in the table below.

The most common way of getting diarrhea as perceived and mentioned by mothers were eating with unwashed hands 26%, eating cold food 26%, lack of latrine 18%, worms 19% and drinking un boiled water. Other issues mentioned are listed in the table below.

Table 3.6 The perceived ways through which one can get diarrhea

Perceived Ways through which one can get diarrhea	No(n =304)	%
Drink un-boiled water	41	13.5
Eating cold food	78	25.7
Eating with dirty/unwashed hands	80	26.3
Lack of latrine	56	18.4
Serving food with dirty/unwashed hands	38	12.5
Eating unwashed fruits	34	11.2
DK	57	18.8
Helmethics	4	1.3
Eating contaminated food	9	3.0
Eating unwanted food	6	2.0
Worms	59	19.4
Breast milk	2	0.7
Poor nutrition	15	4.9
Eating soil	3	1.0
Unwashed food utensils	15	4.9
Uncovered food	6	2.0
Unwashed breasts	1	0.3
Poor home sanitation and hygiene	4	1.3
Comes on its own	2	0.7
Half cooked food	2	0.7
High temperatures	6	2.0
Other diseases	2	0.7
Change of food	4	1.3
Others	11	3.6
When developing teeth	3	1.0
Flies	4	1.3

After mothers had indicated how diarrhea spreads, they were again required to mention how they can prevent it. Still the mothers as demonstrated in the table below suggested a number of ways.

The most common ways suggested were washing hands before eating 25%, boiling drinking water 24%, eating hot food 20%, and washing hands after latrine.

Table 3.7 Perceived ways of avoiding diarrhea

Perceived ways of avoiding diarrhea	No (n =304)	%
Boiling drinking water	72	23.7
Washing hands before eating	75	24.7

Perceived ways of avoiding diarrhea	No (n =304)	%
Washing hands after latrine	58	19.1
Eating hot food	61	20.1
Washing hands before serving food	35	11.5
Proper fecal disposal	60	19.7
DK	72	23.7
Covering food	28	9.2
Giving soft foods	2	0.7
eating ready food	6	2.0
cleaning utensils	35	11.5
Cleaning compound	1	0.3
eating nutritious food	10	3.3
Personal hygiene	5	1.6
Local herbs	6	2.0
Avoiding fatty foods	3	1.0
Change in foods	0	0.0
others	11	3.6
no way	2	0.7
Wash fruits before eating	1	0.3

F.2. Hand washing practices

F.2.1. When mothers normally wash hand

In the effort to establish further how to fight the spread of diarrhea, mothers were asked to indicate when they normally wash their hands.

The most common times mentioned of when they wash hands were after latrine use 61.5%, when hands are dirty 85.2%, and before eating 49%.

Table 3.8 When mothers wash hands

When mothers wash hands	No	%
Before eating	150	49.3
After latrine use	187	61.5
Before serving food	83	27.3
When dirty	177	58.2
Before feeding child	40	13.2
After attending a child that has defecated	15	4.9
DK	2	0.7
After work	11	3.6
Morning	22	7.2
Going to bed	4	1.3

When mothers wash hands	No	%
After peeling	11	3.6
Before preparing food	4	1.3
Any time	6	2.0
After eating	14	4.6
Others	2	0.7
Total	**304**	

F.2.2. Had washing facility at latrine

As the mothers were confessing of washing hands after latrine use, the study aimed also at establishing whether they have a hand washing facility with soap/ash present at the latrine. The majority of the homes whether the mothers surveyed were never had such facility (96%). This is a very general problem, which must also be addressed generally and massively.

F.3. Symptoms that would force the mothers to seek treatment for child with diarrhea

The most common symptom that mothers normally look for in order to take their children with diarrhea to the health facility to seek treatment were mainly weakness or tiredness of children 53%, prolonged diarrhea 31%, dehydration 23% and to some extent fever 19% and vomiting 17%. Other symptoms given are shown in the table below.

Table 3.9 Symptoms that make the mother seek treatment or advice when child has diarrhea

Symptoms	No	%
Vomiting	53	17.4
Fever	57	18.8
dehydration	71	23.4
Prolonged diarrhea	95	31.3

Blood in stool	43	14.1
Weakness or tiredness	162	53.3
Not able to drink/breast feed	76	25.0
DK	6	2.0
Too much diarrhea	19	6.3
Yellow eyes	1	0.3
eating soil	2	0.7
Eating herbs	1	0.3
Nothing	2	0.7
Muscle wasting	1	0.3
Nausea	1	0.3
Others	5	1.6
Total	**304**	

F.3.1. False tooth extraction practices

The mothers were asked if the index child had had any false tooth extraction in last 12 months prior the survey. The index children studied had a good proportion of them 41.2% having gone through the false tooth extraction.

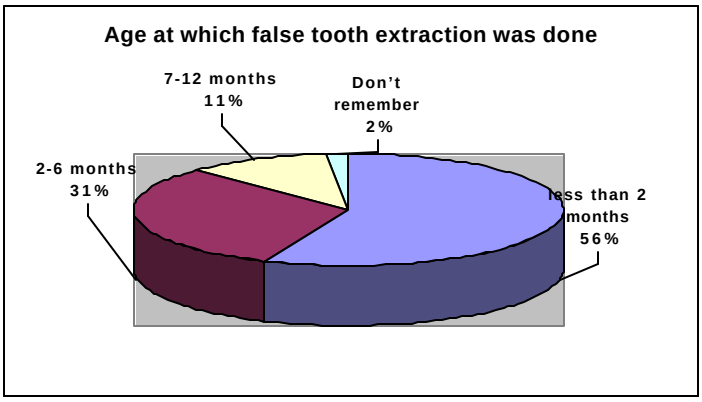
This is a very high proportion of children that suffer the exercise of false tooth extraction that exposes them to a number of infections and other damages.

Table 3.10 Prevalence of false tooth extraction

	False tooth extraction		Total
	Yes	No	
0-5 months	29.5	70.5	61
6-11 months	52.3	47.7	44
12-23 months	51.5	48.5	101
24-35 months	30.6	69.4	72
36-47 months	40.2	59.8	92
48+ months	42.0	58.0	81
Overall	41.2	58.8	451

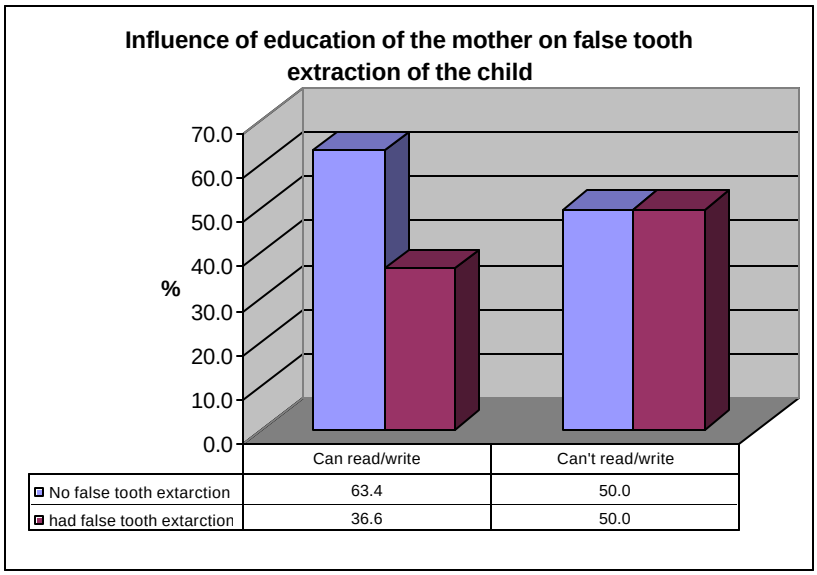
The same what less affected so far are the children aged 0-5 months, and who can be protected if the program starts in time.

Majority of these children get the false tooth extraction when they are still very young i.e less than 2 months 56.5% or just before 6 months of age 31.2%.



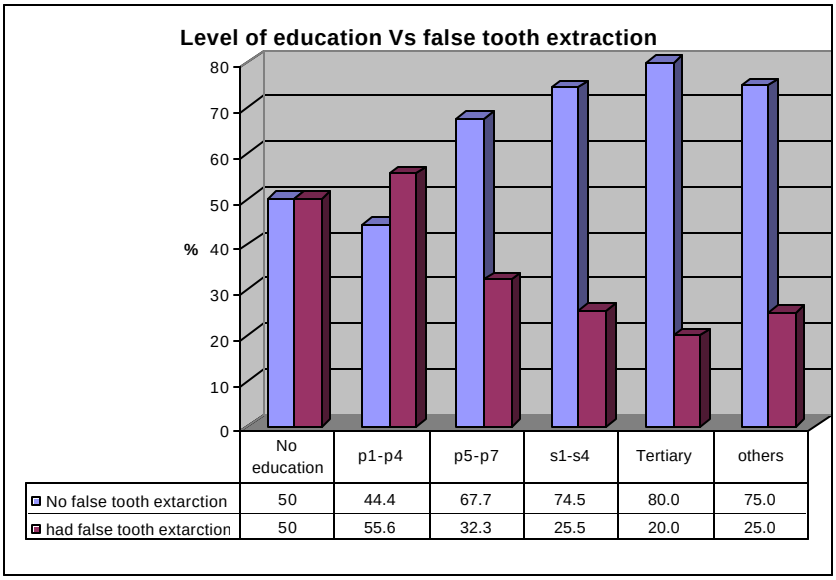
The practice of false tooth extraction was found to be very much influenced by the education of the mother 30% (Gamma =0.26). The mothers who were able to read and write.

Among those who could read and write, majority never took their children for false tooth extraction as compared to those who can read and write. This is well confirmed by the association tests (**X^2=7.5 DF =1, P =0.006**) and in the figure below. Actually a child whose mother could not read and write had almost double the risk of having false tooth extraction than a child whose mother could read and write (**Odds ratio =1.7**).



Taking the association of the education of the mother a bit father, and assuming that those who could not read and write have no education at all, the trend becomes more interesting and real. The proportion of children that have had false tooth extraction were reducing with the increased level of education of the mothers (X^2=16, DF =4, P =0.003). This may

imply that the practice of false tooth extraction can be fought using a education system also. This will help the program to be sustained and have more effect on future generations.



G. Immunization

The immunization issues were only focused on children aged less than 24 months. And a number of issues were studied like the records and evidence of the child having received the required immunization levels.

G.1. Possession of the vaccination records for children by mothers

Mothers were asked if they possessed the vaccination records for the index children, and 58.3% of the children of interest had mothers who possessed their vaccination records.
The rest of the children had their mothers not having their vaccination records.

This was more so among the 0-5 months old children, and the proportion of the children whose mothers had the records was increasing with the age of the child (X^2=14.056, DF =2, P =0.001). It may be that some time back mothers were told to keep the vaccination records of their children and that ended so that the new mothers do not religious keep the records. One may need to find out why this trend.

Table 4.1 Possession of immunization card for index children less than 24 months old

	Have vaccination records		Total
	yes	no	
0-5 months	39.3	60.7	61
6-11 months	59.1	40.9	44

12-23 months	69.3	30.7	101
Overall	58.3	41.7	206

G.2. Immunization coverage

G.2.1. BCG

Of the 120 children that had the vaccination records with their mothers, all most all of them had the vaccinated against BCG, since only 2 children (2%) had a missing date for the BCG. Of those who indicated whether BCG was given or not, 73.4% said the given child received the BCG. However, a good number never indicated the status of the BCG vaccination on a given child. Out of 206 children aged below 24 months, 142 never had their status indicated.

Table 4.2 BCG Immunization status

	BCG Immunization status		Total
Age of child	Been given	Not been given	
0-5 months	40.0	60.0	15
6-11 months	70.6	29.4	17
12-23 months	90.6	9.4	32
Overall	73.4	26.6	64

On observing for the scar, only 54 children were observed for the same of whom 75.9% had the scar present and 24.1% the scar was absent. The absent scares were mainly among the children aged 0-5 months 37.5%, and 6-11 months 37.5% as compared to those aged 12-23 months 13.3%.

G.2.2. OPV

OPV0, on the cards, out of 120 children, 84 children never had the date indicated (70%), and OPV1, only 6 children (5%) had no date for it on the card. Looking at OPV2, and OPV3, 15 (12.5%) and 27 (22.5%) children respectively never had dates when taken indicated on the cards.

G.2.3. DPT

The coverage of DPT at the three levels was well indicated for example the DPT1 only 8 children (7%) had no indication of date for this, 17 children 14% never indicated for DPT2, while 29 children 24% had no indication of DPT3 on their cards.

G.2.4. Measles

54 children (45%) out of 120 who had the vaccination records had no date indicated as to when the child took the measles vaccine.

G.2.5. Vaccination against tetanus, whooping cough and diphtheria

Mothers were asked if the index child was given injection on the left thigh to prevent the child from getting the tetanus, whooping cough or diphtheria.

Though only 60 children had this question answered for them by the parents, among those that responded majority had had the injection 76.7% as compared to those who have not yet 23.3%

Table 4.3 Have had injection in left thigh

	Have had injection in left thigh		Total
	Injected	Not injected	
0-5 months	36.4	63.6	11
6-11 months	70.6	29.4	17
12-23 months	93.8	6.3	32
Overall	76.7	23.3	60

It was not enough to just know whether the child had received the injection of not, but to try and establish how many injections the child has received. The data shows that majority of the children 46.2% had received up to 3 injections though they are still many that have received only 1 injection 12.8% and two injections 33.3%.

Table 4.4 Number of injections received in left thigh

Number	Freq	%
1.00	5	12.8
2.00	13	33.3
3.00	18	46.2
4.00	1	2.6
5.00	2	5.1
Total	39	100.0

G.2.7. Polio vaccinations

Only a total of 50 children had their mothers respond for them about when the first polio drops were given to them. From those that responded, only 20% were given at birth while 76% was after wards and 4% could not recall.

The at birth proportion was only high among the very young children 0-5 months.

Table 4.5 Age when given polio drop was first given

	Age when given polio drop was first given			Total
	Just at birth	Later	Don't know	
0-5 months	50.0	50.0	0.0	6
6-11 months	15.4	84.6	0.0	13
12-23 months	16.1	77.4	6.5	31
Overall	20.0	76.0	4.0	50

Those who had received the polio drops, the mothers were asked to indicate the number of times they have received the drops. Majority had received up to 2 times 42% and others had received 3 drops 30.2% as shown in the table.

Table 4.6 Number of times child received the polio drops

Number of times received the polio drops	No	%
1.00	8	18.6
2.00	18	41.9
3.00	13	30.2
4.00	4	9.3
Total	43	100.0

G.2.8. Measles vaccination

The vaccination against measles at 9 months being given to children was also asked about. Only children aged 9 months and above but less than 24 months are in this analysis. These were 36 in number that responded to the question and of whom, 75% said they have been immunized against measles. Among those aged 9-11 years, no one was vaccinated as yet.

Table 4.7 Has child ever been vaccinated against measles

	Vaccinated against measles		Total
	Yes	No	
9-11 months	0.0	100.0	4
12-23 months	84.4	15.6	32
Total	75.0	25.0	36

G.2.9. Participation levels of children under 24 months in national immunization day

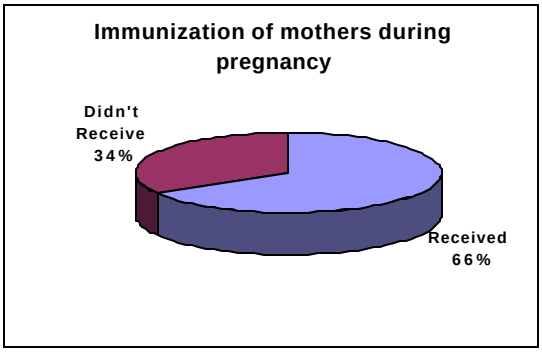
Among the 12-23 months old children, 99% of them had participated in the national immunization days, while among 6-11 months only 51% had participated, and yet another smaller proportion of 23% among the children aged 0-5 months had participated. This could be the reduction in fire of the national immunization days, that is why there is a reduction. The other possible reason could be the increased number of opportunities for the child to participate which increases with the age. Generally, however, 74.8% of the children aged 0-24 months that responded to the question had participated in the national immunization days.

Table 4.8 Has child ever participated in national immunization days

	Ever participated in national immunization days		Total
	Yes	No	
0-5 months	23.1	76.9	26
6-11 months	51.4	48.6	35
12-23 months	98.9	1.1	90
Total	74.8	25.2	151

G.2.10. Immunization of mothers during pregnancy

Mothers were asked if during pregnancy they received the injection to prevent the child from getting convulsions after birth, an anti-tetanus shot or an injection at the top of the shoulder. And about seven in every ten (66%) had received such an injection.



And 37.6% had the card or other documents with the immunization information. The majority hence never had any supporting evidence.

H. FEVER

H.1. Prevalence of fever among index children

The prevalence rate of fever among the children aged 0-59 months was standing at 29.3%, and the least hit children were those aged 0-5 months.

Table 5.1 Prevalence of fever among index children

	Did child have fever		
	Had fever	No fever	Total
0-5 months	14.8	85.2	61
6-11 months	36.4	63.6	44
12-23 months	36.6	63.4	101
24-35 months	27.8	72.2	72
36-47 months	33.7	66.3	92
48+ months	23.5	76.5	81
Overall	29.3	70.7	451

H.2. Feeding habits of children with fever

This section looked at the children still breast feeding, and those who had started eating and drinking. The analysis is therefore focused on the three areas, the breasting experience, the eating of solid/smashed food and drinking.

H.2.1. Breast feeding habits of index children with fever

Among the children that had fever and were still breast-feeding, the study wanted to know how they were breast fed during the time the child had fever. In this section of feeding habits, the total number of children will be changing because children at different ages are able to drink and or eat in addition to breast feeding, and hence if they have not started any of them, the mothers considered that issue as not applicable.

The study showed that out of 50 children, 68% of them were either breast-fed more or same during the time they had fever.

Table 5.2 Breast feeding experience of children with fever

	Did the child breast feed				Total
	More than usual	Same as usual	Less than usual	The child refused to breast feed	Total
0-5 months	22.2	55.6	11.1	11.1	9
6-11 months	21.4	35.7	28.6	14.3	14
12-23 months	24.0	44.0	20.0	12.0	25
24-35 months	0.0	100.0	0.0	0.0	2
Total	22.0	46.0	20.0	12.0	50

H.2.2. Taking of fluids by children with fever

Of the 125 children that had fever and had started drinking, 47.2% and 31.2% were able to drink more than usual and same as usual respectively. In general, those who were able to drink as usual or more than usual were 78.4% as demonstrated in the table.

Table 5.3 Drinking of fluids by child with fever

	Able to drink during fever			Total
	More than usual	Same as usual	Less than usual	
0-5 months	50.0	50.0	0.0	4
6-11 months	33.3	46.7	20.0	15
12-23 months	56.8	16.2	27.0	37
24-35 months	40.0	35.0	25.0	20
36-47 months	43.3	40.0	16.7	30
48+ months	52.6	26.3	21.1	19
Overall	47.2	31.2	21.6	125

H.2.3. Eating of solid/mashed food

The eating of solid/mashed food was somewhat poor than drinking fluids among the children that had fever. In general, 67.7% of these children had to eat more or it as usual during fever.

Table 5.4 Eating of solid/mashed foods by child with fever

	Able to eat solid/mashed food during fever			Total
	More than usual	Same as usual	Less than usual	
0-5 months	50.0	50.0	0.0	2
6-11 months	35.7	14.3	50.0	14
12-23 months	29.7	35.1	35.1	37
24-35 months	35.0	30.0	35.0	20
36-47 months	26.7	43.3	30.0	30
48+ months	38.9	44.4	16.7	18
Overall	32.2	35.5	32.2	121

H.3. Treatment of children with fever

H.3.1. Home fever treatment

Mothers of children that had fever were asked as to whether their children received treatment at home before seeking treatment outside. Out of 122 children that had fever, 51.6% had received treatment at home before going out to other places to seek treatment.

Table 5.5 Child with fever getting treatment at home

	Got treatment at home		Total
	Yes	No	
0-5 months	55.6	44.4	9
6-11 months	37.5	62.5	16
12-23 months	50.0	50.0	36
24-35 months	47.4	52.6	19
36-47 months	55.6	44.4	27
48+ months	66.7	33.3	15
Overall	51.6	48.4	122

The most common form of treatment that children with fever got at home was mainly panadol/maxadol 72.6% and Chloroquine/qawaquine/malaraquine 54.8%. The proportion that received fansidar at home was only 11.3%.

Table 5.6 Nature of treatment given to child with fever at home

Treatment given at home	No	%
Chloroquine/qawaquine/malaraquine	34	54.8
Fansidar	7	11.3
Quinine	4	6.5
Aspirin	1	1.6
Panadol/maxadol	45	72.6
Traditional herbs	6	9.7
Don't remember	1	1.6
Others	9	14.5
Total	62	100

H.3.2. Fever treatment outside home

Apart from home, mothers were asked if they sought treatment of fever from outside home for their children. And about 85% said they went outside home and sought treatment for their children.

Table 5.7 Whether child with fever got treatment outside home or not

	Seek treatment outside home		Total
	Yes	No	
0-5 months	66.7	33.3	9
6-11 months	100.0	0.0	16
12-23 months	89.2	10.8	37
24-35 months	90.0	10.0	20
36-47 months	80.0	20.0	30
48+ months	76.5	23.5	17
Overall	85.3	14.7	129

The children who were taken outside home to seek treatment for fever, they were mainly taken to drug shops 37%, or government health facility/clinic 32%. Others were taken to private physicians 14.5%.

Table 5.8 Where child with fever was taken for treatment other than home

Place where the child was first taken	No	%
Government hospital	9	8.2
Government health facility or clinic	35	31.8
Private physician	16	14.5
Ordinary shop	4	3.6
Drug shop	41	37.3
Market drug vendor	1	9
Village health worker	2	1.8
Others	2	1.8
Total	110	100.0

The treatment given to the child suffering from fever when taken outside home ranged from Panadol/maxadol 65.5%,chloroquine/dawaquine/malaraquine 45.5%, Quinine36.4% and Fansidar 20.9% as the most common forms of treatments given to Blood transfusion or Amodiaquine/camaquine 0.9% as the least common. The details of other forms of treatment are shown in the table below.

Table 5.9 Nature of treatment a child got when taken outside home

Treatment given outside home for fever	Frequency	
chloroquine/dawaquine/malaraquine	50	45.5
Fansidar	23	20.9
Amodiaquine/camaquine	1	0.9

Quinine	40	36.4
Asprin	5	4.5
Panadol/maxadol	72	65.5
Traditional herbs	2	1.8
Don't remember	8	7.3
cough syrup	6	5.5
Blood transfusion	1	0.9
Septrin	18	16.4
Others	8	7.3
Admitted and transfused	3	2.7
Total	110	100.0

H.4. Knowledge of mothers about how to handle fever cases

H.4.1. Symptoms that would make mothers seek advice or treatment for children with fever.

The most common sign that mothers tend to observe on their sick children and would justify the taking of the child straight to the health facility or seek advice are weakness 40%, high temperature 34%, failure to breast feed or drink 33%, vomiting 33% and convulsions 24%. The other symptoms mentioned are indicated in the table below.

Table 5.10 Symptoms that make mothers seek treatment away from home for child with fever

Symptoms	No	%
stiff neck	10	3.3
convulsions	72	23.8
Unconsciousness	26	8.6
General weakness	122	40.4
Failure to breast feed/drink	99	32.8
Vomiting everything	98	32.5
DK	11	3.6
Diarrhea	10	3.3
High temperatures	103	34.1
Breeding through the nose	2	0.7
Uncomfortable	3	1
Shivering	8	2.6
Yellow eyes	9	3
Yellow urine	2	0.7
Cough	4	1.3
Crying a lot	1	0.3
Difficult in breathing	6	2
Others	9	3

Abdominal pains	1	0.3
Body changes	4	1.3
Total responses	302	

H.4.2. What mother think cause malaria/fever

As a way of testing knowledge, mothers were asked to indicate how they think could the cause of malaria. They gave mainly mosquito bites 84.8% as the cause, though 15% said drinking un boiled water can cause malaria. One can not forget to note that 13% said they do not know what causes malaria. Other responses included rain, poor feeding and worms as shown in the table.

Table 5.11 What mothers Perceive as causes for malaria

Perceived Causes of malaria	No	%
Drinking un boiled water	45	14.9
Eating mangos, fresh maize etc	12	4
Change of weather or being beaten by rain	22	7.3
Mosquito bites	257	84.8
DK	40	13.2
Bushes	2	0.7
Stagnant water	1	0.3
Others	5	1.7
Poor feeding	4	1.3
Worms	3	1
Poor hygiene	1	0.3
Total	**303**	**129.4**

H.4.3. What is done to prevent children from getting malaria?

The common ways that mothers know of preventing malaria from attacking them and their children were given and summarized in the table below. The most common ones are clearing compound 28%, eliminating stagnant water 23%, using mosquito nets 21%, closing windows and doors early 24% and boiling drinking water 18%. However, 22.5% said there is nothing they can do to prevent malaria.

Table 5.12 Perceived ways of avoiding malaria

Perceived ways of avoiding malaria	Count	Cases
Boiling drinking water	55	18.2
Avoiding eating mangoes/fresh maize etc	8	2.6
Using mosquito bed nets	63	20.9
Using household sprays	7	2.3
Eliminating stagnant water	69	22.8
Clearing the compound	85	28.1
Using anti-malarial	13	4.3
Traditional herbs	5	1.7
Using local repellants	2	0.7

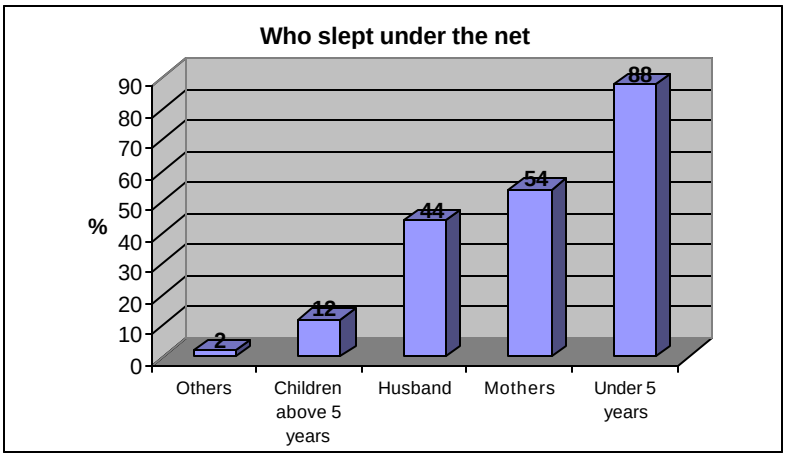
Closing windows and doors early	73	24.2
DK	12	4
Nothing	68	22.5
Cover body at night	8	2.6
Others	12	4
Total responses	**302**	**158.9**

H.5. Use and handling of mosquito bed nets

H.5.1. Use of mosquito bed nets

The mosquito nets were found to be used by only 16% of 304 households visited during the survey. This was irrespective of who used the net during that night.

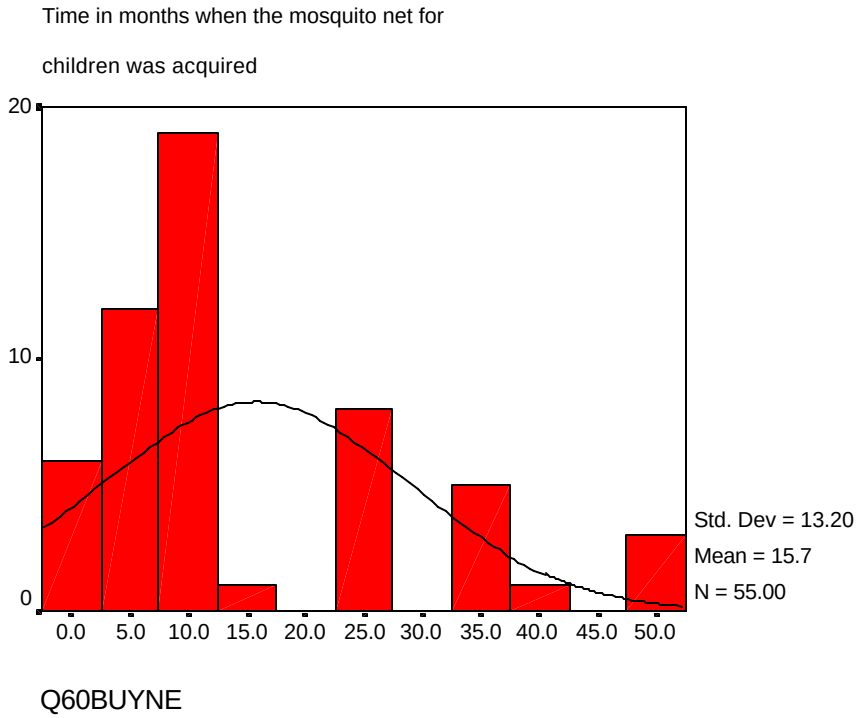
When the mothers were then asked to specify who slept under the net, it was found that majority were children under five years as demonstrated in the bar chart below.



Besides the children under five, the other household members that slept under the net were mothers 54%, husband 44%. The proportion of other children that sleep under the net was small 12% as shown above.

The mosquito nets for children were found to on average 16 months old, with the newest being 1 month old and the oldest 48 months old.

Most of the nets were acquired about 10 months ago, with trend of acquiring them being positively skewed, meaning most of the nets are new nets and just a few are old nets in terms of age. This is well displayed in the histogram of the time in months when the nets were acquired.



H.5.2. Treatment of the mosquito nets with mosquito repellants

When mothers were asked the months that have passed when the nets were last dipped in the repellant, only 23 out of 64 (34%) had dipped the nets, of whom 26% had done it one month prior the survey. 17% said two months ago, 4.3% said 3 months ago and 4 months ago, 8.7% five months ago and 39% could not remember when the dipping was last done.

Most of the nets for the children under five were dipped only once 26%, though about 17% were dipped twice, 39% said they could not remember and the rest dipped them 3 to 5 times ever since they were bought.

Table 5.12 Times the mosquito bed nets have been re-dipped

Times re-dipped	Frequency	%
1.00	6	26.1
2.00	4	17.4
3.00	1	4.3
4.00	1	4.3
5.00	2	8.7
Don't remember	9	39.1
Total	23	100.0

H.5.3. Washing of the mosquito bed net

Most of the mothers confessed of having ever washed the bed nets of their children under five 67% as shown in the table below.

Table 5.13 Washing of mosquito bed net

Washing of the bed net	Freq	%
Washed	35	67.3
Never washed	17	32.7
Total	52	100.0

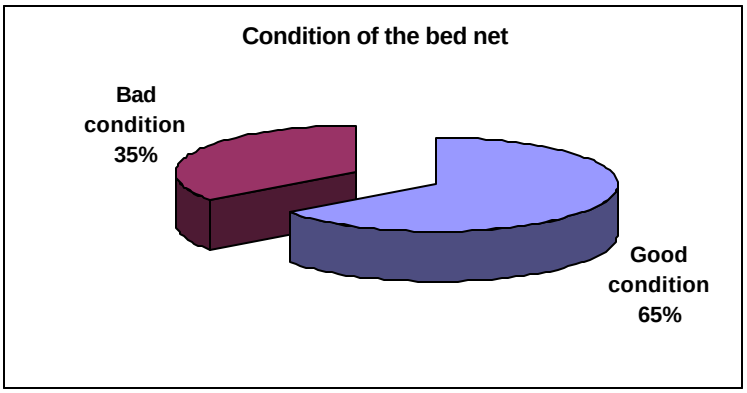
Whereas the mothers who said they have ever washed the bed nets had acquired the said bed net slightly earlier (16 months) than those who said they have never (14 months), the data indicated that the average ages of the bed nets are not significantly different (ANOVA F computed =0.351 P =0.556). This may imply that mothers just do not wash bed nets for the children whether the bed net is new or old, the age of the bed net may be used as an excuse but there is no evidence for that.

For those that have washed the bed net, the majority have done it only either once 20%, or twice 26% or just three times 23%. This is shown in the table below.

Table 5.14 Number of times the mosquito bed has been washed

Times washed the net	Frequency	%
1.00	7	20.0
2.00	9	25.7
3.00	8	22.9
4.00	1	2.9
5.00	2	5.7
6.00	6	17.1
14.00	1	2.9
Don't remember	1	2.9
Total	35	100.0

When the mother indicated that an index child slept under the net, she was asked to bring the net for observation by the enumerator. The nets which were found with holes they were categorized as in bad state, while those still intact were in good state. From the data, 65% of the observed nets were in good state and were somewhat effective in protecting the children from mosquito bites.



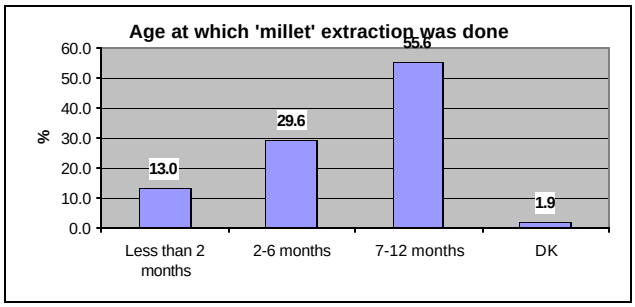
H.6. 'Millet' extraction prevalence and practices

In general terms, 12% of the index children were taken for 'millet' extraction in 12 months prior the survey. It is not clear whether some mothers refused to commit themselves and simply said don't know.

Table 5.15 Prevalence levels of 'millet extraction'

	Ever been taken for millet extraction			Total
	Yes	No	DK	
0-5 months	6.6	88.5	4.9	61
6-11 months	13.6	81.8	4.5	44
12-23 months	11.9	88.1	0.0	101
24-35 months	11.1	84.7	4.2	72
36-47 months	13.0	82.6	4.3	92
48+ months	16.0	80.2	3.7	81
Overall	12.2	84.5	3.3	451

Most of these children have been taken for the extraction of the 'millet' at an age of 7-12 months as shown in the chart below.



H.7. Knowledge and practice of mothers in preventing malaria during pregnancy

H.7.1. How one can prevent malaria during pregnancy

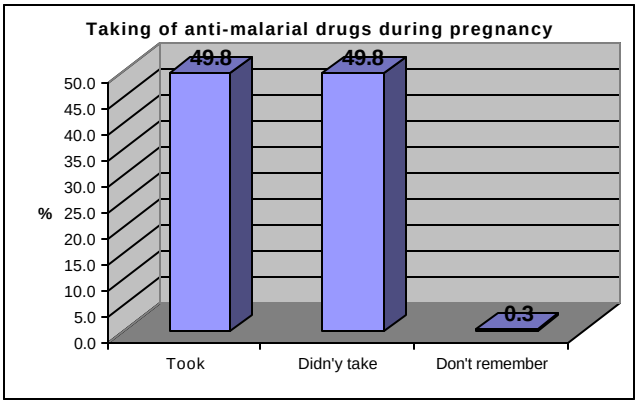
The following ways are known to the mothers through which they can avoid malaria when they are pregnant. The most common ones are use of ITNs 49%, taking anti-malarial 37%, closing windows and doors early 19% and others as indicated in the table.

Table 5.14 Perceived ways of how a pregnant mother can prevent fever/malaria

How a pregnant mother can prevent fever/malaria	No	%
Windows and doors are closed	58	19.2
Anti-mosquito insecticide is sprayed	5	1.7
Compound cleared of bush	29	9.6
Stagnant water cleared	29	9.6
Use mosquito coil	5	1.7
Burn plant leaves	6	2
Burn cow dung	1	0.3
Take anti-malarial drugs	112	37.1
Use ITNs	147	48.7
DK	49	16.2
Attend Antenatal care	5	1.7
Sleeping early	1	0.3
Avoid un boiled water	25	8.3
Nothing	7	2.3
Feeding well	4	1.3
Others	3	1.0
Total responses	302	161.3

H.7.2. Practice of the pregnant mother in taking anti-malarial drugs

Whereas it is advisable that pregnant mothers should take anti-malarial drugs during pregnancy, about 50% of the mothers confessed that they never took the drugs during pregnancy of the youngest child. This is a very high proportion that should be brought down.



The most common drug taken by the pregnant mothers was fansidar 82% and only 11% said they took chloroquine while the rest took other drugs.

Table 5.15 Anti-malarial drug taken by mothers during pregnancy

Drug taken during pregnancy	Freq	%
Chloroquine	17	11.3
Fansidar	124	82.1
Others	10	6.7
Total	151	100.0

H.7.3. Place where mothers go for the drugs

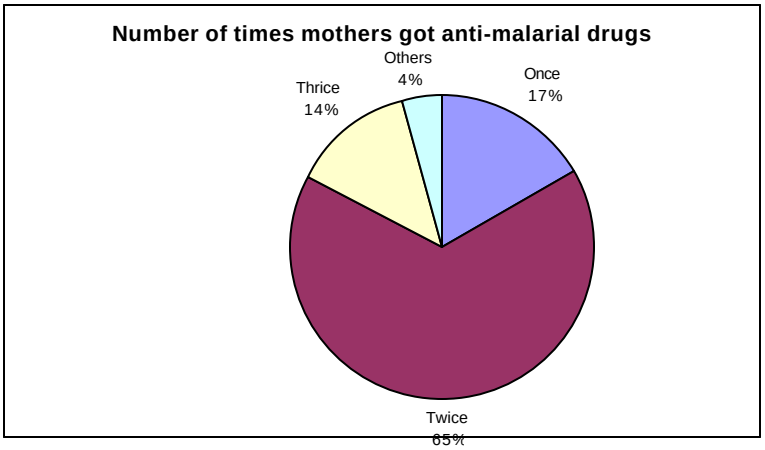
Most mothers said they obtained the drugs from Health center III 51.3%, and health center IV 14%, while others went to private clinics 11.3%. Only 9% went to hospital. The rest of the sources are shown in the table.

Table 5.16 Place where pregnant mothers went for anti-malarial drugs

Place where pregnant mothers went for drugs	Frequency	%
Traditional birth Attendant	1	0.7
Health center III	77	51.3
Health center IV	21	14.0
Hospital	14	9.3
Private clinic	17	11.3
Drug shop	7	4.7
Others	16	10.7
Total	150	100.0

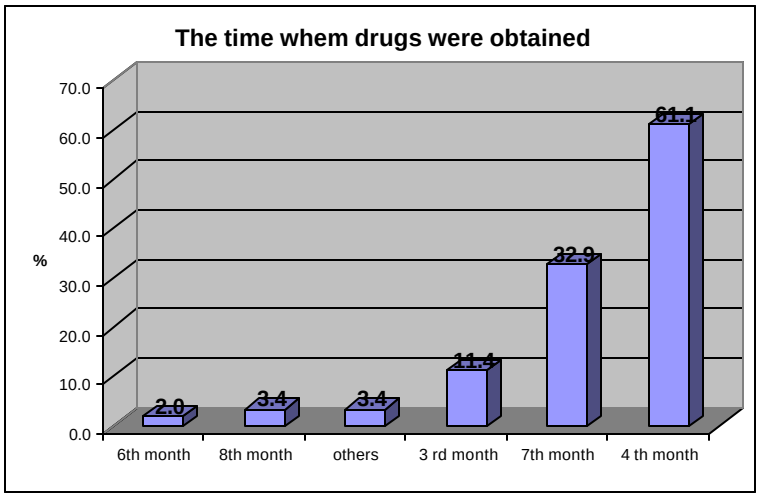
H.7.4. Number of times the mothers got the ant-malarial drugs

Majority of the mothers said they got the drugs twice 65%, while 17% got the drugs only once and 14% got them thrice. This is shown in the table below.



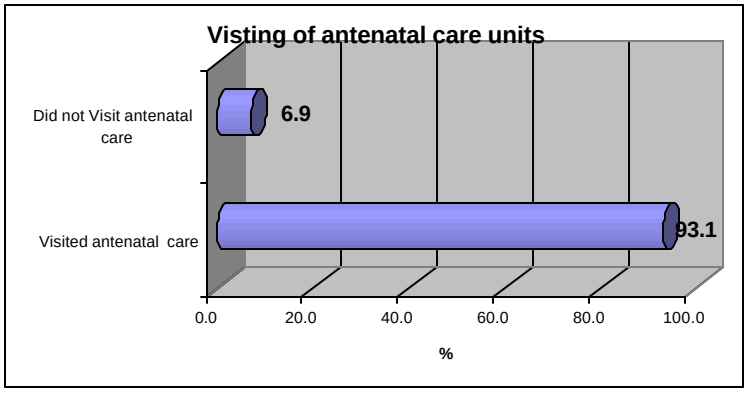
H.7.5. Time of pregnancy when the anti-malarial drugs were taken

The mothers that had had the anti-malarial drugs were asked the stage of pregnancy when the drugs were taken. The majority mentioned at 4th month 64.4%, and 7th month 32.9%. The others took the drugs at different stages as shown in the bar chart.

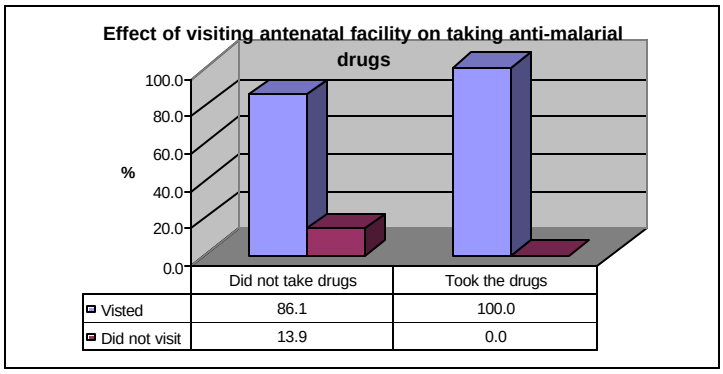


H.7.6. Use of antenatal care facilities during pregnancy

The visiting of the antenatal care services was very high among the mothers 93% as demonstrated in the figure below. This was as done during the last pregnancy that the mothers had where mothers visited the facilities.



The data also further showed that there was a strong association between the mother visiting the antenatal clinic and taking of anti-malarial drugs during pregnancy (X^2=22.56, DF =1, P =0.000). Among the mothers that visited the antenatal facilities, they all took anti-malarial drugs during pregnancy, while those who never visited, 14% never took the drugs. The effect is that 100% of the pregnant mother taking the anti-malarial drugs during pregnancy is influenced by her going to the antenatal facilities (Gamma =1.00). This is shown by the fact that 100% of those who visited took the drugs, and this may be due to the emphasis that staff put on the taking of the anti-malarial drugs.



The most common place that mothers went for the antenatal care services were health center 77%, and to some extent clinics 17%. Other places are indicated in the table below.

Table 5.17 Place that mothers went for antenatal care services

	No	%
Drug shops owner/attendant	2	0.7
Staff in clinic	49	17.1
Staff at health center	221	77.0
TBA	10	3.5
Community based health worker	6	2.1

Others	7	2.4
Total	**287**	

I. HIV/AIDS

I.1. Knowledge of HIV/AIDS

Out of 304 mothers interviewed, only 1 said she has never heard of AIDS. Hence 99.6% have ever heard of AIDS which is almost 100%.

I.1.1. How one can tell that some one has AIDS

The main signs that mothers said they look up to in order to know that some one has HIV/AIDS are mainly loss of weight 68%, skin rash 47%, persistent fever 16%, diarrhea 16% and cough 30%. Other signs are as outline in the table below.

Table 6.1 Perceived ways that one knows that some one has AIDS

How one knows that some one has AIDS	No	%
Loss of weight	207	68.3
Clinical testing HIV positive	15	5
Constant sickness	40	13.2
Cough	91	30
Persistent fever	48	15.8
Loss of appetite	4	1.3
Skin rash	142	46.9
Diarrhea	47	15.5
Dehydration	3	1
Spots on the body	6	2
Hair loss	28	9.2
Itching of the body	7	2.3
Boils	38	12.5
Anemic	1	0.3
Skin ulcers	3	1
Red lips	6	2
Over sleeping	1	0.3
DK	24	7.9

Herperzoster	11	3.6
If people start saying it	3	1
Vomiting	1	0.3
Others	18	5.9
Total responses	**303**	**245.5**

1.2. Perceived ways of avoiding HIV/AIDS

Of the 304 mothers interviewed, 4 opted not to answer the question of whether they think some one can avoid AIDS. However, of the 300 that answered, 93.3% said they think some one can avoid AIDS, while 3% said it is not possible to avoid it and 3.7% said they do not know if one actually avoid it.

Table 6.2 Attitude of whether one can or can not avoid HIV/AIDS

Can one avoid AIDS	Freq	%
Yes	280	93.3
No	9	3.0
DK	11	3.7
Total	300	100.0

The how to avoid aids, mothers gave many ways through which this can be done as shown in the table below.

Many responses were given by mothers on possible ways of avoiding AIDS, but the most common ones were abstaining from sex 84%. Use of condom 54% and limiting sex to one partner 31%. The other ways are shown in the table.

Table 6.3 Perceived ways of how to avoid HIV/AIDS

How to avoid HIV/AIDS	Count	Cases
Abstain from sex	240	84.2
Use condom	155	54.4
Limit sex to one partner/stay faithful to one partner	87	30.5
Limit the number of sexual partners	5	1.8
Avoid sex with prostitutes	2	0.7
Avoid sex with a person who has many sexual partners	2	0.7
Avoid blood transfusion	6	2.1
Avoid injection	26	9.1
Avoid kissing	4	1.4
Avoid sharing razor blades	40	14
Give birth in hospital	1	0.4
Use own syringes and needles	3	1.1
Avoid drinking from the same cup	2	0.7

Others	4	1.4
Go to TASO	1	0.4
DK	1	0.4
Total responses	**285**	**203.2**

I.3. Knowledge of ways of transfer of HIV/AIDS virus from mother to child

Mothers were asked if they knew different ways through which the virus that causes AIDS may be transferred from the mother to the child during different stages and responses are as shown in the table.

During pregnancy, 67% of the interviewed mothers said the child can get the virus from the mother, while 23% said the child can not get the virus.

At the delivery point, 83% of the interviewed mothers said it is possible for the child to get AIDS from the mother while 10.6% said the child will remain safe.

During breast feeding, however, a very high proportion expressed ignorance of the fact that a virus can be transferred to the child from the positive mother 20% and those who said no also were high 23.8%, while just 56% said the child can get the virus during breast feeding.

Table 6.4 Knowledge of ways of transfer of HIV/AIDS virus from mother to child

	Can a HIV/AIDS virus be transferred from the mother to child during		
Response	Pregnancy	Delivery	Breast feeding
Yes	66.9	83.2	56.1
No	23.2	10.6	23.8
DK	9.9	6.3	20.1
Total	**302**	**303**	**303**

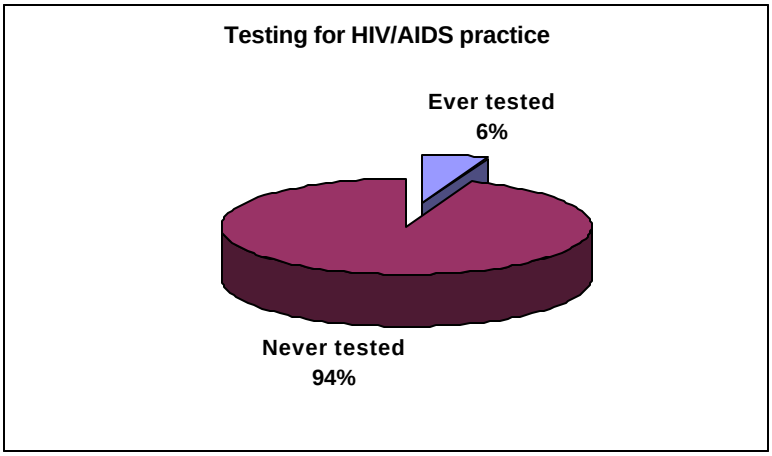
I.4. Testing of HIV/AIDS services and practices

89% of the 304 mothers interviewed said they have heard of testing for HIV/AIDS services, while 10.6% have not heard of them, while 0.3% just do not know. And most of the mothers said if they wanted to test for the HIV/AIDS they would just go to hospitals 55.8%, or VCT center 38.2%. Other places mentioned are indicated in the table.

Table 6.5 Place where mothers think one can go for testing of HIV/AIDS

Place where to test for HIV/AIDS	Frequency	%
Hospital	168	55.8
Health clinic	19	6.3
VCT center	115	38.2
Others	22	7.3
DK	19	6.3
Total	**301**	

When the mothers were asked to indicate if they have ever tested for the HIV/AIDS, two mothers out of 304 never answered the question, and those who answered majority have never tested. Only 6% said they have ever tested for the HIV/AIDS.



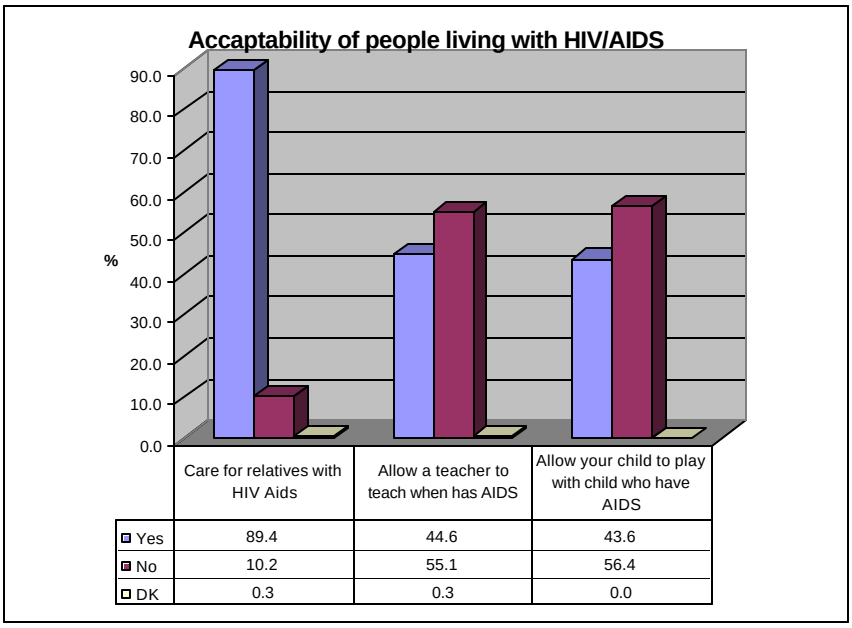
Those who have ever tested, 94% of them had received counseling before getting tested, and again 94% got the results. And of those who received the results, 87.5% got counseling after they had the results.

1.5. Acceptability of people living with HIV/AIDS

A number of issues were put before the mothers and they were used to access how people living with HIV/AIDS are accepted in the community where they live. One of the issues raised was a relative falling sick of HIV/AIDS and getting care from a relative. Majority of the mothers said they can look after them very well 89.4% and oly 10.2% said they can not.

Another issue raised with the mother was of teachers that have AIDS but not sick, whether they should be allowed to teach or not. Quite a good proportion of the mothers said they should not be allowed to teach 55.1%. This could be attributed to a number of issues like the defilement cases of pupils by teachers and this may put the mothers in a tricky situation to comment other wise.

What of the children playing with other children who have HIV/AIDS, most of the mothers said no to that 56.4%.



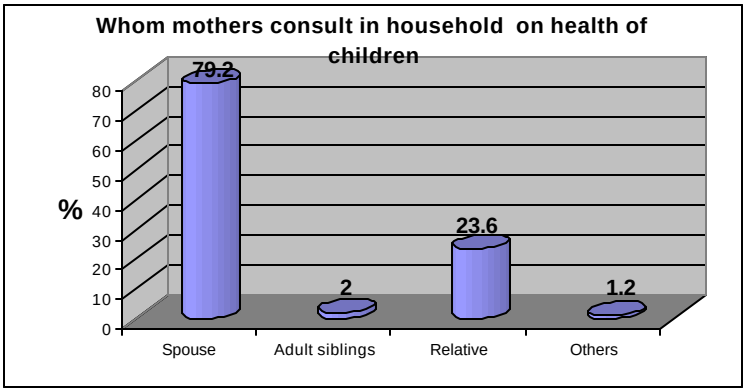
	Care for relatives with HIV Aids	Allow a teacher to teach when has AIDS	Allow your child to play with child who have AIDS
Yes	89.4	44.6	43.6
No	10.2	55.1	56.4
DK	0.3	0.3	0.0

This means the social acceptance of people living with HIV/AIDS have not yet been fully accepted in the communities they stay in.

J. CARE SEEKING

J.1. Consultations about health at household level

Mothers were asked if they do consult at household level about the health of her children, and 82.8% said they do have some one that they normally consult, while 17.2% do not. The person(s) whom mothers consult are normally spouses 79.2%, relatives 23.6% and others consult older siblings. This indicates that the health issues of the child at household level they are not only on the shoulders of the mother but the farther to.



Other than household level, mothers do consult other people who are not those in the household. And about 86% said they do consult other people other than the members of the household about the health of the children while 13.8% do not.

And the people that mothers normally consult about the health of the children are neighbors 59%, mother in-laws 37.3%, medical doctors 22%, community health workers 26%, TBA 23% and to some extent grand mothers 10%. The rest of the people consulted by mothers are shown in the table 7.1

Table 7.1 People that mothers consult outside home about health of their children

People that mothers consult outside home	Frequency	%
Mother in-law	98	37.3
Grandmother	27	10.3
Mother	24	9.1
Neighbor	155	58.9
Medical doctor	58	22.1
Community health worker	68	25.9
TBA	62	23.6
Traditional healer	3	1.1
Religious leader	2	0.8
Friends	16	6.1
Others	17	6.5
Total	**263**	

J.3. Cases where mothers think a sick child should be taken to health facility right away.

A number of instances were listed by mothers when they have to rash their sick children to heath facility straight way, and the most common as shown in the table were fever 71%, child becoming sicker 38%, when not able to breast feed or drink 20%. Others are breathing fast 15%, drinking poorly 15%, and vomiting 12%.

Table 7.2 When the mothers said they would take the sick child straight to health facility

When the mothers said they would take the sick child straight to health unit	No	%
Child not able to drink/breast feed	61	20.1
Child becomes sicker	114	37.5
Child develops fever	216	71.1
Child has fast breathing	45	14.8
Child has difficulty in breathing	73	24
Child has blood in stool	19	6.3
Child is drinking poorly	45	14.8

Vomiting	37	12.2
Diarrhea	19	6.3
Convulsions	20	6.6
DK	7	2.3
Pimples	2	0.7
Change of eyes like sunken eyes	4	1.3
Shivering	2	0.7
Cough	3	1
Crying	2	0.7
Yellow urine	1	0.3
Kwashiorkor	1	0.3
Stiff neck	1	0.3
Unconsciousness	1	0.3
Others	9	3
Injury	1	0.3
Total responses	**304**	

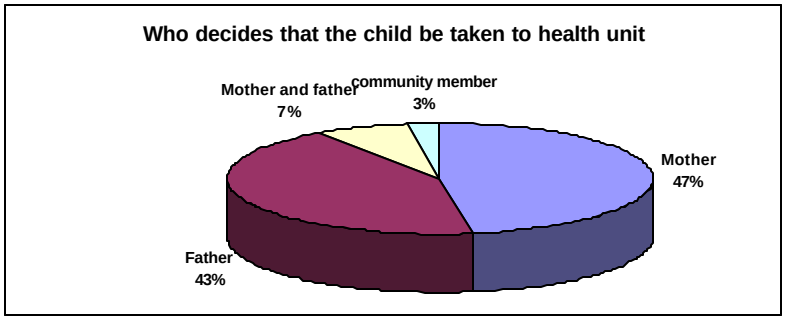
J.4. Actual health seeking by mothers for children

Of the 304 mothers interviewed, 281 (92.3%) had ever taken their children to health facility. It was important to know how many days that had to pass between the time the mother knew that the child was sick and the actual taking of the child to the health unit. The majority of the mothers waited up to 1 day 36%, though others just took the child straight away 18.9% while others waited up to two days 26.8%. In some instances mothers waited up to 8 days and above as shown in the table. This however, must have depended mainly on the severity of the sickness and how the mother viewed the child.

Table 7.3 Days that passed before taking the child to health unit after knowing that the child was sick

Days that passed before taking the child to health unit after knowing that the child was sick	No	%
The very day	53	18.9
One day	102	36.4
Two days	75	26.8
Three days	22	7.9
Four days	10	3.6
Seven days	15	5.4
Eight days	1	.4
Fourteen days	1	.4
Thirty days	1	.4
Total	**280**	**100.0**

The decision to take the sick child to health unit was made mainly by the mother 47% or the father 43% and in some instances both 7%, though in some cases community



members came in to take the child to health center 3%. This could have been in the absence of the parents at home may be when the child became sick.

And eventually, mother 90.4% mainly took the child to health unit. The cases where the fathers took sick children to health unit were only reported by 2.1% of the women.

Table 7.4 Who took the child to health unit

Who took the child to health unit	Freq	%
Mother	254	90.4
Father	6	2.1
Others	21	7.5
Total	281	100.0

When the children were taken to the health unit, only 42.9% of them were asked to be taken back, the rest did not need a call back. And of those asked to be taken back, only 75% were actually taken back, the rest 24.4% just stayed home.

Table 7.5 Took back the child as required

Took back the child as required	Frequency	Valid Percent
Yes	90	75.6
No	29	24.4
Total	119	100.0

The main reasons given for not taking back the child to the health unit as required were child becoming well before the appointment time. In some instances, the mothers just waited to see a change

Table 7.6 Reasons why mothers did not take children back.

Reasons why mothers did not take children	Freq	%

back.		
Could not afford additional costs	1	3.4
Child became well before referral was due	21	72.4
Waited to see any change	4	13.8
Was satisfied with treatment given	2	6.9
Mother was sick	1	3.4
Total	29	100.0

2.7.4 Referral experiences and responses by mothers to such referrals

Other than taking the sick child back to the health worker, mothers were asked if the health workers referred them to other health units/hospitals. And 14.7% of the 34 mothers that had taken the children sick to health workers said they were referred to other health units. All of them were referred to a hospital.

Table 7.7 Mothers with sick children being referred

Were you ever referred	No	%
Yes	5	14.7
No	29	85.3
Total	34	100.0

Of 5 mothers referred to the hospital with their children, 3 managed to go there (60%) while the other two failed to go there. And the main reason given for failing to go there was additional costs being an affordable.

2.7.5 Accessibility and evaluation of the health services

It was of big concern as to why some mothers may prefer other sources of treatment for their sick children to the health facility.

a) Constraints that discourage mothers from taking sick children to common health unit

The main deterrent, which was mentioned by mothers, was financial costs involved 64.9%. Knowing that this is a peasant community, any thing that involves money puts off many people. It would be very dangerous if people fail to get access to health facilities due to costs.

The other issues raised by mothers were long distance 10.6%, and when the mother is her self sick and yet the children are taken to these health facilities by their mothers. This may call for the sensitization of men to take personal responsibility when children fall sick to see that they are taken to health units and are given treatment.

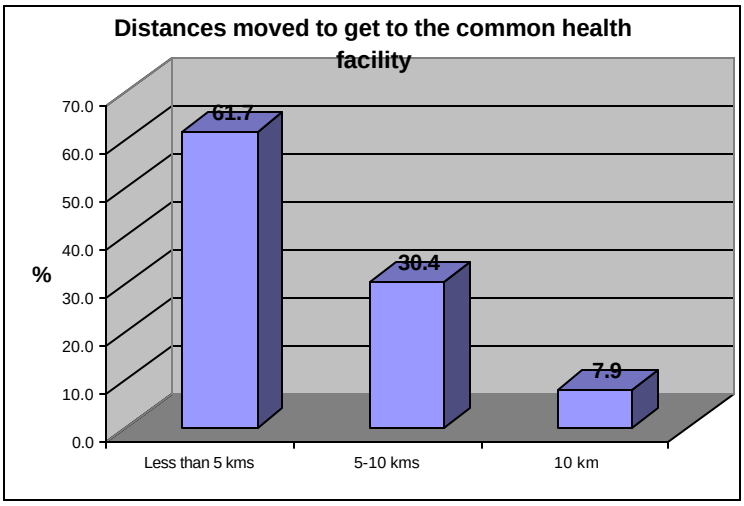
Table 7.8 Why mothers may fail to take their sick children to the health unit

Why mothers may fail to take their sick children to the health unit	Frequency	
Financial costs	196	64.9
Easy access to drugs outside health facility	9	3.0

Quality of care is less than satisfactory	10	3.3
Distance	32	10.6
Time away from work	2	0.7
Time away from other children	7	2.3
competing needs in household	6	2.0
Lack of decision making capacity to take child to health unit	16	5.3
Nothing	82	27.2
Disease to be treated by herbs	2	0.7
Transport	10	3.3
Cultural beliefs	3	1.0
When mother is sick	15	5.0
If not seriously sick	1	0.3
Others	4	1.3
Total	302	

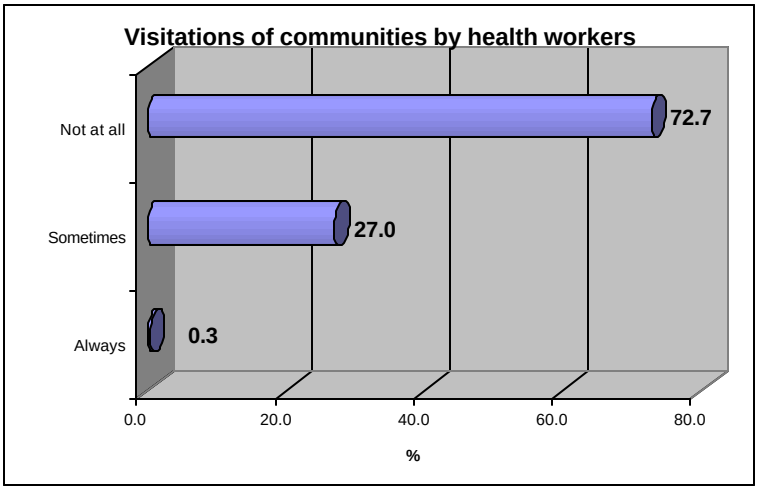
b). Distances moved by mothers to the common health unit

On the evaluation of the accessibility, the study looked at the distances that mothers move in order to reach the common health facility, and 61.7% were moving a distance of less than 5 kms, while 30.4% move 5-10 kms and the rest 7.9% move for more than 10



kms. This may be a long distance in a village setting where over 90% of the population use foot as the main means of transport, given that one is taking a sick child that must be taken straight away.

2.5.6 Visitation of communities by health workers



The other area evaluated was the health works and the community perception. Mothers were asked if the health workers normally visit the communities that they serve. And the mothers revealed very interesting results. 72.7% said these health workers have never visited the communities while 27% said they do visit sometimes while only 0.3% said they always visit the communities. If part of the role of the health workers is to visit the communities, then this is an indication that they are not doing well on this aspect.

Attachment 1

Survey Clusters

Sub-county	Parish	Villages	Cluster No	Population hhds	sample size hhds
Kayonza	Kabasheshe	Kabasheshe Center	1	94	11
Kayonza	Katooma	Kyabukuju	2	47	6
Kayonza	Kijubwe	Shagasha	3	57	7
Kayonza	Kyobwe	Nyakigyera	4	59	7
Ihunga	Butanda	Butanga	5	55	7
Ihunga	Butanda	Kyenkuku	6	56	7
Ihunga	Kagamba	Kasyoro 1	7	57	7
Ihunga	Kitondo	Kyabugimbi	8	81	10

Ihunga	Nyakibigi	Kiziko	9	70	8
Ihunga	Rutunguru	Rujumo 1	10	55	7
Bwongyera	Iterero	Nyakasharara	11	42	5
Bwongyera	Katomi	Bwongyera	12	88	11
Bwongyera	Kitojo	Rwamarebe	13	38	5
Bwongyera	Kyabashenyi	Rwenkuba	14	64	8
Bwongyera	Kyaruhuga	Kishariro 1	15	84	10
Bwongyera	Rwanda	Rutezo	16	43	5
Rugarama	Kagongi	Kagyeyo 1	17	59	7
Rugarama	Kakanena	Kakanena 1	18	80	10
Rugarama	Kagongi	Murambi	19	86	10
Rugarama	Ngomba	Rwentunda 11	20	55	7
Rugarama	Nyakabungo	Ibare	21	95	11
Nyakyera	Kiyoora	Nyakasa	22	96	12
Nyakyera	Ngoma	Nyakanengo	23	84	10
Nyakyera	Kibingo	Kigarama	24	159	19
Ruhaama	Kafunjo	Sofia Town	25	199	24
Ruhaama	Kishami	Kyakashambara	26	245	29
Ruhaama	Ruhaama	Nyakagando	27	122	15
Itojo	Buhanama	Nyakabare	28	36	4
Itojo	Itojo	Kikunyu	29	78	9
Itojo	Nyongozi	Ishunga	30	113	14

Attachment 2

List of Enumerators and Supervisors

Name	Position/place of work
1. Turyagira Shebah	HMIS Focal person-Ntungamo District
2. Komwezi Agatha	E/N-Ntungamo H/U
3. Bombona Loy	Accounts Assistant-Rushenyi HSD
4.Asiimwe Dorothy	E/M- Itojo Hospital
5. Bamwine Fred	Records Assistant- DDHS =Office
6. Leocardia Mugisha	R/N&M Patience Domiciliary Clinic-NtungamoTown/Council
7. Nabuloli Leah	Health Assistant-Rubaare Sub-county
8. Bwendero Apollo	Reproductive health Coordinator-DDHS= Office
9.Akankwasa Johnson	Health Assistant-Ntungamo Town Council

Annex 4: Memorandum of Understanding

MEMORANDUM OF UNDERSTANDING

BETWEEN

AFRICARE AND NTUNGAMO DISTRICT LOCAL GOVERNMENT

Annex 4: Memorandum of Understanding

A. INTRODUCTION

This Memorandum of Understanding (MoU) made this day of .....2004, between the District of Ntungamo acting by and through its District Chairperson and Chief Administrative Officer (hereinafter referred to as **"District of Ntungamo"**), which expression shall where the context so admits include its successor-in-office and assignee) and

Africare, a private, non-profit development assistance organization based in Washington, D.C. United Sates of America, (hereinafter referred to as "Africare") and a Country Office in Kampala and Field Office in Ntungamo.

Whereas:

i The Uganda Ministry of Health is willing to assure the provision of a minimum package of public health and clinical services to all its population and IMCI is one of the components of the minimum health care package;

ii The first phase of Africare's CIMCI Project has made excellent progress as indicated by the findings of the midterm evaluation and final evaluation and this vital work needs to continue and expand the impressive gains of the CIMCI Project and to consolidate results of the first phase;

iii The CIMCI - Plus project will extend Africare's child survival work from the eight sub-counties already served in the first phase, to the other seven sub-counties of: Itojo, Ruhaama, Nyakyera, Rugaraama, Bwongyera, Ihunga, and Kayonza in the district.

iv The CIMCI - Plus Project will provide experience-based inputs to help build the support network and to document and disseminate lessons learned, so that CIMCI is truly embedded in Uganda's national health care programs and policies; and

v Africare assistance under CIMCI Plus project is made possible by a major grant given to Africare by the United States Agency for International Development (USAID) and match funds from other donors.

Therefore Africare and Ntungamo District agree as follows:

B. PROJECT DESCRIPTION AND FRAME WORK

The goal of CIMCI-Plus is to reduce morbidity and mortality of children under five and improve the health

status of women of reproductive age in the Ntungamo District, by the end of 2008. To reach this goal, CIMCI-Plus has 4 general objectives:

(1) Promote knowledge and behavior related to the prevention of childhood illnesses, at household and community levels; (2) Improve home management of the sick child by promoting timely and appropriate care seeking at the household and community levels; (3) Improve accessibility of under-five children and women of reproductive age to quality health services and products, both at facility and community levels; and (4) Strengthen national and district MoH capacity to replicate and sustain the community IMCI approach.

CIMCI-Plus focuses on 5 interventions, and the estimated level of effort for each intervention is as follows: malaria (35%), immunization (25%), HIV/AIDS (15%), nutrition, micro-nutrients and breast-feeding (15%) and diarrhea (10%). Pneumonia case management is addressed as part of the holistic CIMCI approach. Immunization and HIV/AIDS interventions have been incorporated in Phase II of the project as evolving priorities to enhance accessibility and facility linkages.

C. IMPLEMENTATION STRATEGY

Consistent with MOH strategies and policies, the CIMCI-Plus is a five-year effort, with activities launched in all new 7 sub-counties in the first year. By end of year 4, it is expected that all sub-counties will be self-reliant and during year 5, local partners will carry out most activities with minimal support. CIMCI-Plus will continue to support district planning, documentation, dissemination and national policy. The strategy aims to: (1) Build on lessons learned from Africare's CIMCI Project phase one; (2) Utilize Uganda's decentralized system that vests authority and resources in the districts; (3) Integrate with other district and country child survival initiatives; and (4) Consider the particular needs of target communities in planning activities.

CIMCI-Plus will be sustained through partnering with Ntungamo District Health Services, MOH, national NGOs and networks, and through advocacy and documentation and dissemination. Ntungamo District shall fully cooperate with Africare to help facilitate, arrange and mobilize the human, material and in-kind support needed at the District, Sub-county and all local council levels for the successful implementation of the CIMCI-Plus.

D. PROJECT DURATION

Contingent upon availability of funds, the project's intended duration is from October 1,2003 through September 30, 2008. No Africare financial support and services shall be provided and no goods or

services shall be furnished or delivered past September 30, 2008 except with the written agreement of Africare Headquarters in Washington, DC.

E. PROJECT STAFFING

Africare will maintain autonomous management structures at headquarters in Washington, D.C., Kampala and and Ntungamo field office. The line of supervision is Africare/Washington Regional Director ÷ Africare/Uganda Country Representative ÷ Child Survival Program Coordinator.
The Office of Health and HIV/AIDS at Africare provides technical oversight and supports the project staff in Ntungamo.

During CIMCI phase one, the Project established strong organization, administrative, financial and managerial systems that will serve CIMCI-Plus. The Program Coordinator supervises all field program staff. Africare/Uganda Country Office liaises with USAID/Uganda, central MoH, national and international NGOs and agencies. The Country Office provides technical assistance in organizational development of the national partners and provides administrative oversight.

In Ntungamo District, key positions, affiliation and primary duties of staff participating in the implementation of CIMCI - Plus are: (1) Program Coordinator (Africare), who will lead and provide overall management oversight for CIMCI Plus; (2) Behavior Change Communication /Training Officer(Africare), who will organize and manage behavior change communication and training activities; (3) Research/ Monitoring & Evaluation Officer (Africare), who will develop and implement the monitoring and evaluation community system; carries out operations research studies and tracks progress against CIMCI planned activities; (4) Field Officers (Africare) who will mobilize communities; facilitate community training, support outreach activities and role of parish development committees and other community own resource persons . The afore mentioned program staff will work closely with the District health Team and health sub-district whose primary role will be to coordinate, supervise and monitor district child survival plans. In executing their duties, they will involve community resource persons, community-based organizations , faith based organizations and other women groups as contained in the detailed implementation plan

F. SUPPORT TO PROJECT

Subject to the availability of funds from USAID, the overall value of Africare support to the project is **$ 1,299,999 .** Included in this amount are Africare expatriate and Ugandan staff salaries and benefits, international and local consultant fees, training activities and supervision in Ntungamo District, and resources necessary to establish and maintain day to day operations of the project office. This amount includes funding for professional and administrative backstopping and assistance, international travel and allowances for the

Annex 4: Memorandum of Understanding

Africare Headquarters and country office staff.

The Ntungamo District and Ugandan Ministry of Health's **IN-KIND** contribution is estimated at $433,333 and consists of the value of staff salaries, costs to re-orient district staff towards the CIMCI strategy and costs related to training and supervision.

G. PROJECT MANAGEMENT AND ADMINISTRATION

The Program Coordinator, a Ugandan, will oversee the Africare Ntungamo project activities. S/he will ensure proper management and administration of Africare provided funds**,** materials, equipment and supplies in line with Africare grant agreements with donors and established Africare policies and procedures.
The Program Coordinator will be responsible for ensuring that accurate and timely programmatic and financial planning and reporting is submitted to Africare/Washington.

The Africare /Uganda Country Representative will provide overall oversight for Africare in- country support to the project including supervision of the project coordinator, liaising with USAID and the Ministry of Health and providing in-country support to the project. The MoH National IMCI Coordinator will act as the MoH liaison for the project.

On matters relating to technical and logistical coordination of IMCI activities, the Program Coordinator will communicate and relate directly with appropriate Ntungamo District Health authorities and MoH officials. The Program Coordinator will share all communications with the Africare Country Representative and defer to the country Representative on matters related to Africare policies and procedures.

H. DISBURSEMENT OF PROJECT FUNDS

Africare/Uganda main shilling and/or domiciliary accounts are maintained in Kampala. Signatories are the Country Representative and/or Administrative Officer of Africare/Uganda. All funds for the project will be transferred under authorization by Washington to the Africare/Uganda main account in Kampala. The project will have a project checking account in Ntungamo which will be solely an Africare Project account. Signatories to the account will include the Program Coordinator and the Africare Country Representative or someone delegated by him/her.

Quarterly fund transfers to the project checking account will be established by Africare based upon Africare's review and acceptance of a detailed work plan and budget for Africare's fiscal year (July -June), and updated project quarterly spending reports, work plans and budgets. The senior accountant based at

the Country Office in Kampala will monitor project accounts. The Program Coordinator and Africare Ntungamo accountant shall maintain, a standard acceptable to Africare, proper accounting and administrative records, receipts, procurement procedures, and financial reports.

Competitive quality and prices shall be sought for locally procured goods and services, to maximize the benefits that can be obtained from use of project funds. Procurement procedures, their documentation, and inventory controls and equipment supply records shall meet standards required by Africare and its donors. Financial accounting, procurement and inventory records on goods and services financed by Africare shall be open for review by Africare and its representatives. All non disposable capital assets procured with Africare funds shall remain in the title of Africare until otherwise approved in writing by Africare headquarters.

I. USE OF AFRICARE PROVIDED FUNDS, VEHICLES, ETC.

Use of Africare provided funds, vehicles, equipment and supplies shall be only for those purposes authorized under donor grant agreements and Africare policies. Any question in this respect shall be directed to the Africare Country Representative.

At the completion of Africare's involvement with CIMCI Plus in Ntungamo District, ownership of vehicles and equipment supplied under the project by Africare shall remain with or revert to Africare which shall under the circumstances and in consultation with donors deserve the right to designate the vehicles and equipment for CIMCI Plus project activities in Ntungamo District or other uses for Africare Uganda.

J. CLAIMS FOR DAMAGES

Africare is responsible neither for claims nor damages resulting from work undertaken by the **District** and its local suppliers, collaborators, entrepreneurs and workers under this MOU, nor for legal disputes between the District Local Government and those parties.

Likewise, the District Local Government is responsible neither for claims nor damages resulting from work undertaken by **Africare**, nor for legal disputes between Africare and its local suppliers, collaborators, entrepreneurs and workers.

If an employee of either party to this agreement is accidentally injured, disabled or killed in the course of his/her employment, the party employing him/her shall be solely responsible in respect of any claims that

may arise therefrom..

K. RESIDENT VISAS AND PERMITS

Ugandan Ministry of Health and Ntungamo District authorities shall assist the work of Africare expatriate personnel and consultants who may be required to travel from time to time by facilitating the granting of visa extensions or residence permits, and by facilitating such travel within Uganda necessary to perform their assigned tasks.

L. CUSTOMS, DUTIES, TAX EXEMPTIONS

The Uganda ministry of Health and Ntungamo District authorities shall assist the project by facilitating efforts to:

- Exempt from all customs, duties and taxes for vehicles, equipment and supplies consigned to Africare/Uganda in support of the project, as well as those imported by Africare for the efficient support of the project.
- Ensure the exemption of the expatriate project consultants from all direct taxes and social security payments on salaries and consulting fees received from Africare for services rendered in connection with this project.

M. SAFETY AND CONDUCT OF AFRICARE EMPLOYEES

The **District** shall do all in its power to ensure the security and safety of Africare personnel and project property, and shall reserve the right to request Africare, through the Country Representative, to recall any of its employees whose conduct warrants it.

N. PROGRAMMATIC PLANNING, NARRATIVE REPORTING AND EVALUATION

The planning and reporting documents due from the Program Coordinator to Africare.

- Baseline survey report: January 15, 2004
- Detailed implementation plan; April 15, 2004
- Quarterly work-plans and budgets: 15 of the month preceding the end of a quarter
- Quarterly Reports : Every quarter beginning October 2003
- Annual Reports : The first is due September 15, 2004

The schedule set forth will promote sound planning and implementation of the project, enable appropriate consultant support and backstopping by Africare, and allow Africare to meet requirements placed upon it by its donors.

Annex 4: Memorandum of Understanding

O. AMENDMENTS TO THIS PROJECT AGREEMENT AND TERMINATION

Changes in terms of this Agreement shall be only in the form of written and signed Amendments executed prior to any substantial deviation from the presently set forth scope of work, terms of work performance and budget. The agreement to such amendments shall be evidenced by signatures of the District Chairperson and the Africare Country Representative.

Either party to this agreement may terminate the agreement in part or in full by providing ninety (90) days written advance notice to other Party.

Signed and agreed to this date

..... of April, 2004

For:	Ntungamo District Government	For: Africare Uganda
Name:	**Mr. John W. Karazaarwe**	**Dr. Abdalla B. Meftuh**

Annex 4: Memorandum of Understanding

Title:	District Chairperson	Country Representative
Name:	**Mr. Dan Butera**	**Mr. John Musinguzi**
Title:	Secretary for Finance and Planning	Acting Program Manager Uganda Food Security Initiative
Name:	**Mr. Alex B. Byarugaba**	**Mr. Robert Mwesigwa**
Title:	Chief Administrative Officer	Program Coordinator
Name:	**Mrs. Grace Twinomugisha**	
Title:	Secretary for Health and Children's Welfare	
Name:	**Dr. William Kalikwistya**	
Title:	Director of District Health Services	

Preliminary Life of Program Work Plan[1]

Work Plan Activities	Year 1		Year 2		Year 3		Year 4		Year 5	
Quarters	1/2	3/4	1/2	3/4	1/2	3/4	1/2	3/4	1/2	3/4
Planning/Project start up activities										

[1]The Work plan may be modified during the preparation of the detailed implementation plan. However, the modification will not affect objectives and interventions of CIMCI Plus Project.

Annex 4: Memorandum of Understanding

Work Plan Activities	Year 1		Year 2		Year 3		Year 4		Year 5	
Quarters	1/2	3/4	1/2	3/4	1/2	3/4	1/2	3/4	1/2	3/4
Update, develop and sign MOUs with district and national partners with emphasis on synergies and integration	X									
Hiring of additional staff, orientation and posting field staff in target sub-counties	X									
Procurement of additional office equipment and supplies	X	X								
Program Mobilization and Planning Workshops with DHT (13 members), local authorities, district and national partners	X									
Conduct Baseline KPC survey, qualitative and facility assessments and disseminate results to partners	X									
Update inventory of IEC materials, assess community tools, adapt and translate training and IEC materials	X									
Identify all community structures (PDC members and CORPs), networks of informal and traditional providers	X	X								
Develop DIP with partners and submit to USAID	X									
IMPLEMENTATION PHASE										
BCC Activities										
Review, refine and adopt available BCC tools including development of new BCC messages	X	X								
Application of PRA, BEHAVE framework, and positive deviance approach			X	X	X	X	X	X	X	X
Community participatory meetings, prioritization, mobilization and sensitization			X	X	X	X	X			
Health education sessions to disseminate key household messages			X	X	X	X	X	X	X	X

Annex 4: Memorandum of Understanding

Work Plan Activities	Year 1		Year 2		Year 3		Year 4		Year 5	
Quarters	1/2	3/4	1/2	3/4	1/2	3/4	1/2	3/4	1/2	3/4
Household visits, data collection and IEC materials distribution				X	X	X	X	X	X	X
Linking communities and promoting referral to health units and community resources (bed net and condom outlets, chloroquine distributors, PTCs and HIV/AIDS counselors				X	X	X	X	X	X	X
Training and orientation										
Conduct training needs assessment	X	X								
TOT program for 5 district trainers on CIMCI		X								
Train 21 sub-county trainers (3 per sub-county) on CIMCI		X								
Train members of 40 PDCs (800) members in CIMCI			X	X	X	X	X	X		
Train 120 health providers in phases based on type of provider on counseling for the 16 key family practices.			X	X	X	X	X			
Sensitize 50 drug shopkeepers and 70 traditional healers using the negotiation approach				X	X	X	X			
Train 50 chloroquine distributors in case management with emphasis on CIMCI key household behaviors			X	X	X					
Train 7 sub-county Health Assistants in CIMCI, outreach and CHIS			X	X						
Train 175 TBAs, 42 women groups and 142 drama groups on the 16 key family practices				X	X	X	X	X		
Train 110 community-based HIV/AIDS peer-counselors on appropriate messages and referrals			X	X	X	X	X	X		
Train 70 water user committees on hygiene behavior					X	X	X	X		
Supervision and follow-up support for trained and oriented staff and community structures			X	X	X	X	X	X	X	X

Annex 4: Memorandum of Understanding

Work Plan Activities	Year 1		Year 2		Year 3		Year 4		Year 5	
Quarters	1/2	3/4	1/2	3/4	1/2	3/4	1/2	3/4	1/2	3/4
Capacity Building Activities										
Adaptation and adoption of capacity building tools (ISA and COPE)	X									
Establishment of baseline capacity for local partners	X									
TOT training for 8 URCS and 6 DENIVA national staff on the implementation of CIMCI		X	X	X						
Revitalization of NGO IMCI Steering Committee and promote NGO network linkage with the MOH			X	X	X	X	X	X	X	X
Scaling up CIMCI in the first three districts outside Ntungamo through lead national NGOs							X	X	X	X
Project staff development through short courses/seminars				X	X	X	X	X		
M&E/Operations Research/Documentation and dissemination activities										
Develop and adopt the community health information system including data collection tools, jointly with partners		X								
Implementation of the CHIS with regular data interpretation and dissemination		X	X	X	X	X	X	X	X	X
LQAS implementation to assess immunization coverage		X		X		X		X		X
Mid term quantitative and qualitative assessments including capacity building followed by mid-term evaluation					X					
Three OR studies conducted and disseminated				X		X		X		
Documentation including quarterly newsletters and dissemination of experiences and lessons learned		X	X	X	X	X	X	X	X	X
Two annual conferences jointly organized with partners						X		X		

Annex 4: Memorandum of Understanding

Work Plan Activities	Year 1		Year 2		Year 3		Year 4		Year 5	
Quarters	1/2	3/4	1/2	3/4	1/2	3/4	1/2	3/4	1/2	3/4
Final quantitative and qualitative assessments including capacity building followed by Final Evaluation									X	
Management Activities										
Quarterly planning and review meetings with DHT and sub-districts	X	X	X	X	X	X	X	X		
Support visits from the Country Office	X	X	X	X	X	X	X	X	X	X
Monthly staff planning and management meetings	X	X	X	X	X	X	X	X	X	X
Development and submission of quarterly and annual reports	X	X	X	X	X	X	X	X	X	X
Headquarter technical backstopping for program activities	X	X	X	X	X	X	X	X	X	X

1. The work plan may be modified during the preparation of the detailed implementation plan. However, the modification will not affect objectives and interventions of CIMCI Plus project.

Mwesigwa Johns Robert

P.O. Box 129, Ntungamo Uganda. East Africa Tel: 256 485 24057 Mob: 256 77 701015
Email: mwesigwar@africaonline.co.ug, afrcimci@africaonline.co.ug

SUMMARY
Health planner and sociologist with 8 years of working experience in health planning, project management and coordination, action research, monitoring and documentation. Significant experience in child health, research (both in public and private health sectors) and health decentralization. A Ugandan national with ability to perform and work in rural and complex communities, with analytical and strong communication skills. Fluent in English, in addition to Runyankole/Rukiga mother tongue.

PROFESSIONAL EXPERIENCE

March 1, 2002 to date: Program Coordinator, Community-based Integrated Management of Childhood Illnesses Plus Project. Provide supervisory and technical guidance to all the field staff, coordinate with the ministry of health in planning and implementation of project activities, Oversee other five complementary and match funded projects: 1) Water for Child Health, 2) HIV/AIDS Awareness and Prevention, 3) HIV/AIDS Volunteer Service Corps, 4) Title II HIV/AIDS Initiative, and 5) Africare WorldSpace HIV/AIDS Initiative. Coordinate activities of complementary projects ensuring effective synergies. Provide dynamic and result oriented leadership to maximize impact and value of money. Participate in designing proposals of sufficient merit particularly in areas of child survival and HIV/AIDS (detailed job description attached).

December – January 2003/4: Participated in the Africare Rwanda Detailed Activity Plan (DAP) design mission. Major responsibility was to integrate HIV/AIDS in the food security program

August 2003 – December 2003: Played a key role in putting together a proposal for community integrated management of natural resources and HIV/AIDS in Ntungamo District. It was funded for January 2004 through June 2006

November 2003 to date: Duly registered member of the American Public Health Association (APHA) in Califonia

September 17, 03: Actively participated in designing the HIV/AIDS indicators that are part of the results frame work of the mission's strategic objectives and mandatory indicators as stated in USAID's Expanded Response Guide to Core Indicators for Monitoring and Reporting the President's International (PI) Mother to Child HIV Prevention Initiative

August 2003: In partnership with UPHOLD Uganda, initiated the visit of the Mission (Uganda) to Africare Ntungamo that culminated into putting together a CIMCI-Plus nutrition complementary proposal. The proposal has been shared with USAID Washington for potential funding up to the tune of US $ 300,000.

February-June, 2003; with guidance from CORE, played a pivotal role in putting together the concept paper that attracted funding from CORE, for the Uganda NGO Malaria and Childhood Illnesses Secretariat 2003/4.

March – October, 2002: Played a key role on behalf of Africare to develop a concept paper that brought Africare Uganda into a consortium of the other three NGOs to receive funds from Glaxo SmithKline, UK funds are being used to implement a three year (March 2003 – February 2006) Uganda Malaria Partnership UMPP Project.
May – December 2002: Played a key role as field Contact person in preparing and writing the CIMCI-Plus extension proposal obtained the highest score of ten proposals under the extension category in 2003.

Project Coordinator, CIMCI Africare/Ntungamo, Southwestern Uganda (March 2002 to date)

Acting Project Coordinator, CIMCI Africare/Ntungamo, Southwestern Uganda (November 2001)
As part of CIMCI Project Design, a host national project staff was meant to take over after two years from the expatriate Coordinator. With this objective I was mentored and provided the opportunity to serve as Acting Project Coordinator. During the period, provided technical support to technical and field project staff, planned and coordinated the implementation of CIMCI activities including complementally projects. As acting coordinator, strengthened partnerships with the district, successfully planned organized and hosted visitors from John Hopkins University and delegates of visitors from five districts of Uganda on a learning tour from the project. Got familiar with project financial, management and administrative systems including USAID funded child survival program policies. The mentoring role that the Expatriate Coordinator provided enabled me to eventually assume the position of the Project Coordinator.

Action Research Officer, Africare Ntungamo, Southwestern Uganda (August 2000-March 2002)
Provided a leading role in planning, organizing and conducting the CIMCI baseline and midterm evaluation K.P.C participated in preparing and writing the Africare/Ntungamo District CIMCI revised detailed implementation plan (DIP). Planned, organized and conducted the outpatient turn up assessment (OTA) study for CIMCI to quantify and document increased turn up of patients at health facilities in target sub-counties, whose result informed the project and the district to redirect project implementation. Designed the Africare/Ntungamo District CIMCI quarterly newsletters and the Africare/Ntungamo District CIMCI monitoring plan process indicators. With support from the project staff, planned and organized the inventory study for private health providers in Ntungamo District, whose results were used to design the training strategy of the project. The study provided benchmarks for working with the informal health sector under CIMCI. Worked with DENIVA to develop a directory of NGOs/CBOs in Ntungamo District. Including an assessment of relationship between NGOs/CBOs and Ntungamo District to foster effective collaboration. The directory and the assessment reports are providing useful information critical to CIMCI success through networking and information sharing.

Research Associate, Makerere Institute of Social Research (MISR), Makerere University, Kampala, Uganda (Jan 1996-August July 2000)

Developed and participated in research Proposals of sufficient scientific merit. 1) *"Determinants of Caretaker Behavior in the Management of ARI/Pneumonia "An Exploratory Study of Mothers with Under-fives in Bushenyi District-Uganda"* It informed the IMCI community on the importance of behavior change at community level to foster prompt care-seeking, 2) *"Who gets squeezed or Co-opted? The Integration of the private Sector into the Government Health Care System in Uganda*" whose results contributed to the acceleration of the integration of the private health providers into the health care system to capture patients including seeking care from private sources, and 3) under the auspices of the International Health Policy Program (IHPP)-World Bank, Prepared and wrote a technical research and financial proposal entitled *"Private And Public Delivery Of Health Services In Rural Uganda"* implemented in Mbarara District of Uganda. Results have been used as one of the key reference material in designing the frame work for involving health sector providers under the IMCI strategy MoH (Uganda).

PUBLICATIONS AND PRESENTATIONS

Africare Uganda (September, 2003): Paper presentation on: Application of Household and Community IMCI in Ntungamo District Ntungamo District of Western Uganda. Presented at American Public Health Association, San-Francisco

Mwesigwa (2002): paper presentation on "Significance of Data on Formulation of Child Health care Strategies" Presented at the second child health operational research conference, November 5-7, 2002, Kampala. Uganda. The conference was organized by MoH, WHO, UNICEF, BASICS II and Africare. Co-authored the Ministry of Health Program and Abstract Book. Towards evidence based IMCI policy; Second Child Health Operational Research Conference November 5-7, 2002 Kampala, Uganda

Mwesigwa (et al): September 9-11, 2002 presented a paper *on "Use of facility and Community Data to Influence Strategy Formulation of the Child Survival Program in the Ntungamo District of Uganda"* It was presented at Data for Action workshop, Maryland, Washington D.C.

Africare Ntungamo: Paper on *"Experiences and Lessons of Malaria Prevention and Control Activities in the Context of IMCI"* Circulated to participants on Nov 29, 2001 at AMREF International Training Facility, Nairobi Kenya (unpublished)

Mwesigwa (2001): Paper on *"Experiences and Lessons on monitoring Community Component of IMCI in Ntungamo District"* Presented on May 2-5, 2001 International Conference Center, Kampala (unpublished)

Mwesigwa 2000: Characteristics of Rural Private Clinics in Mbarara District, IHPP, Washington D.C.

Mwesigwa (1998): Paper on *"Health Sector reforms in Developing Countries Challenges and way forward"* Presented on August 24, 1998 at Metropolitan University, United Kingdom

Mwesigwa (1995): Paper on *"The Position of Rural Private Clinics in the health care Delivery system in Uganda"* Presented to international agencies namely; International Health Policy Program (IHPP) Washington D.C., ODA and World Health Organization at the workshop held at Makerere Institute of Social Research (MISR)

RECENT PROFESSIONAL WORKSHOP ATTENDED

September 12, 2002. Attended a one day CORE workshop at Academy for Education and Development (AED) Washington D.C. Contributed to the strategic plan for the FY 3

September 13, 2002. Attended the USAID request for Application "RFA" workshop Number M/OP03-002 FY-FY 2003 Child Survival and Health Grants Program (CSHGP) at Holiday Inn, Maryland D.C.

EDUCATION/TITLES

Masters Degree in Health Management, Planning and Policy (HMPP), Nuffield Institute for Health, University of Leeds, United Kingdom 1998

Bachelor of Arts Degree in Social Sciences (BA SS) with a bias in Sociology, Makerere University, Kampala Uganda 1995

Certificate in Project Planning and Management (PPM), at Young Men Christian Association (YMCA), Kampala Uganda, 1994

Annex 6: CSHGP DATA FORM

FIELD CONTACT INFORMATION:

First Name:	Abdalla
Last Name:	Meftuh
Address:	P.O Box 7655, Kampala, Uganda
	Plot 28, Nakasero Road
City:	Kampala
State/Province:	
Zip/Postal Code:	
Country	Uganda
Telephone:	256-41-230266, 256-41-348605
Fax:	256-41-348604
E-mail:	abmeftuh@africaonline.co.ug, Africare@africaonline.co.ug
Project Web Site:	www.africare.org

PROJECT INFORMATION:

Project Description	Ntungamo's needs are great and growing. High infant and child mortality of 98 and 176/1,000 live births respectively characterize child health in the proposed extension area. This is attributed to high prevalence of malaria, diarrhea, malnutrition, and to a lesser degree, pneumonia. Immunization rates have recently fallen dramatically with only 38% of children 12-23 months fully vaccinated and only 18% of pregnant women covered for Tetanus Toxoid. HIV/AIDS prevalence is estimated higher than the national figure of 6.1%, and maternal mortality is estimated at 505/100,000 live births. The CIMCI-Plus Project extends Africare's child survival work from the 8 sub-counties already served in the first phase, to the other 7 sub-counties of the district.

Project Description:	CIMCI-Plus will reach 82,091 new beneficiaries comprised of 39,180 children under five and 42,911 women of reproductive age. In addition, it

	will indirectly benefit an estimated 104,476. CIMCI-Plus will spread the impact of the CIMCI methodology far beyond Ntungamo. CIMCI-Plus will provide experience-based inputs to help build the support network and to document and disseminate lessons learned, so that CIMCI is truly embedded in Uganda's national health care programs and policies. With its partner, Ntungamo District Health Services, Africare seeks to further impact child health in the Ntungamo and beyond. The goal of CIMCI-Plus is to reduce morbidity and mortality of children under five and improve the health status of women of reproductive age in the Ntungamo district, by the end of 2008. To reach this goal, CIMCI-Plus has 4 general objectives: 1. To promote knowledge and behavior related to the prevention of childhood illnesses, at household and community levels; 2. To improve home management of the sick child by promoting timely and appropriate care seeking at the household and community levels; 3. To improve accessibility of under-five children and women of reproductive age to quality health services and products, both at facility and community levels; and 4. To strengthen national and district MOH capacity to replicate and sustain the community IMCI approach.
Partners:	Ntungamo District Health services is the key implementing partner. Others include: MOH for policy frame work and advocacy; WHO and UNICEF for technical guidance; URCS co-implementer, AIM program, AIC and TASO co-implementers and provide technical support in the HIV/AIDS intervention areas; UFSI II, ADRA and Kyera farm project for provision of technical assistance in the Nutrition intervention; UWESO for identification and training of orphan care givers; Makerere University for data management and documentation; CBOs for sustaining CIMCI activities in the Sub-county; and MACIS will be a fora for dissemination of CIMCI-Plus project's experiences and lessons.
Project Location:	Ntungamo District is located in South Western Uganda bordering Kabale and Rukungiri Districts in the West, Bushenyi in the North, Mbarara in the East and Republic of Rwanda in the South (see map in attachment.) The District was created in 1993 by administrative re-organization of two districts of Bushenyi and Mbarara. Being newly created, it lacks the infrastructure of well-established districts. In 2001 the sub-county of Itojo, previously part of Mbarara, was added to Ntungamo. With a total area of 1,930 square kilometers, Ntungamo is composed of three counties of Kajara, Rushenyi and Ruhaama. These are sub-divided into 15 sub-counties consisting of 86 parishes and 879 villages. The population of Ntungamo is 386,816 of whom 99% are rural according to the 2002 population and housing census.

GRANT FUNDING INFORMATION:

USAID Funding:(US $)	$1,299,999	**PVO match:(US $)**	$383,880

TARGET BENEFICIARIES:

Type	Number
Infants (0-11 months):	12,028
12-23 month old children:	12,028
24-59 month old children:	15,124
0-59 month old children:	39,180
Women 15-49:	42,911

BENEFICIARY RESIDENCE:

Urban/Peri-Urban %	Rural %
1%	99%

GENERAL STRATEGIES PLANNED:

Private Sector Involvement
Strengthen Decentralized Health System
Information System Technologies
Information System Technologies

M&E ASSESSMENT STRATEGIES:

KPC Survey
Organizational Capacity Assessment with Local Partners
Organizational Capacity Assessment for our own PVO
Participatory Rapid Appraisal
Participatory Learning in Action
Lot Quality Assurance Sampling
Community-based Monitoring Techniques
Participatory Evaluation Techniques (for mid-term or final evaluation) KPC Survey

BEHAVIOR CHANGE & COMMUNICATION (BCC) STRATEGIES:

Interpersonal Communication
Peer Communication
Support Groups
Positive deviant approach
Behave framework

CAPACITY BUILDING TARGETS PLANNED:

PVO	Non-Govt Partners	Other Private Sector	Govt	Community
• US HQ (CS unit) • CS Project Team US • HQ (CS unit) • CS Project Team US, • HQ (CS unit) • CS Project Team	(None Selected)	• Private Providers	• Dist. Health System • Health Facility Staff	• Health CBOs • Other CBOs • CHWs Health • CBOs

INTERVENTIONS:

Immunizations 25 **%**
** IMCI Integration
** CHW Training
** HF Training
*** Classic 6 Vaccines
*** Vitamin A
*** New Vaccines
Control of Diarrheal Diseases 10 **%**
** IMCI Integration
** CHW Training
** HF Training
*** Water/Sanitation
*** Hand Washing
*** ORS/Home Fluids
*** Feeding/Breastfeeding
*** Care Seeking
Malaria 35 **%**
** CHW Training
** HF Training
*** Care Seeking, Recog., Compliance
HIV/AIDS 15 **%**
** CHW Training
** HF Training
*** Behavior Change Strategy

*** Access/Use of Condoms
Nutrition/Micronutrients/Vitamin A (Combined) 15 **%**
** IMCI Integration
** CHW Training
** HF Training
*** Gardens
*** Comp. Feed. from 6 mos.
*** Hearth
*** Cont. BF up to 24 mos.
*** Iron Folate in Pregnancy

Indicator[1]	Numerator	Denominator	Estimated Percentage	Confidence line
1. Percentage of children age 0-23 months who are underweight (-2 SD from the median weight-for-age, according to the WHO/NCHS reference population)	0	0	0.0	0.0
2. Percentage of children age 0-23 months who were born at least 24 months after the previous surviving child	0	0	0.0	0.0
3. Percentage of children age 0-23 months whose births were attended by skilled health personnel	0	0	0.0	0.0
4. Percentage of mothers of children age 0-23 months who received at least two tetanus toxoid injections before the birth of their youngest child	200	304	65.8	0.11
5. Percentage of infants age 0-5 months who were exclusively breastfed in the last 24 hours	47	61	77	0.21
6. Percentage of infants age 6-9 months receiving breast milk and complementary foods	31	35	88.6	0.21
7. Percentage of children age 12-23 months who are fully vaccinated (against the five vaccine-preventable diseases) before the first birthday	118	120	98.3	0.13
8. Percentage of children age 12-23 months who received a measles vaccine	27	36	75.0	0.13
9. Percentage of children age 0-23 months who slept under an insecticide-treated bed net the previous night (in malaria-risk areas only)	88	304	28.9	0.06
10. Percentage of mothers who know at least two signs of childhood illness that indicate the need for treatment	260	304	85.5	0.06
11. Percentage of sick children age 0-23 months who received increased	238	304	78.3	0.12

[1] Baseline data was not collected for indicators 1, 2, and 3 because they are not part of the CIMCI Project's intervention areas.

Indicator[1]	Numerator	Denominator	Estimated Percentage	Confidence line
fluids and continued feeding during an illness in the past two weeks				
12. Percentage of mothers of children age 0-23 months who cite at least two known ways of reducing the risk of HIV infection	240	285	84.2	0.10
13. Percentage of mothers of children age 0-23 months who wash their hands with soap/ash before food preparation, before feeding children, after defecation, and after attending to a child who has defecated	76	304	25.0	0.44